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B I O L O G I A
CENTRALI-AMERICANA.

I N S E C T A.

COLEOPTERA. VOL. IV. PART 5.

RHYNCHOPHORA.

CURCULIONIDÆ.

CURCULIONINÆ (continued).

BY

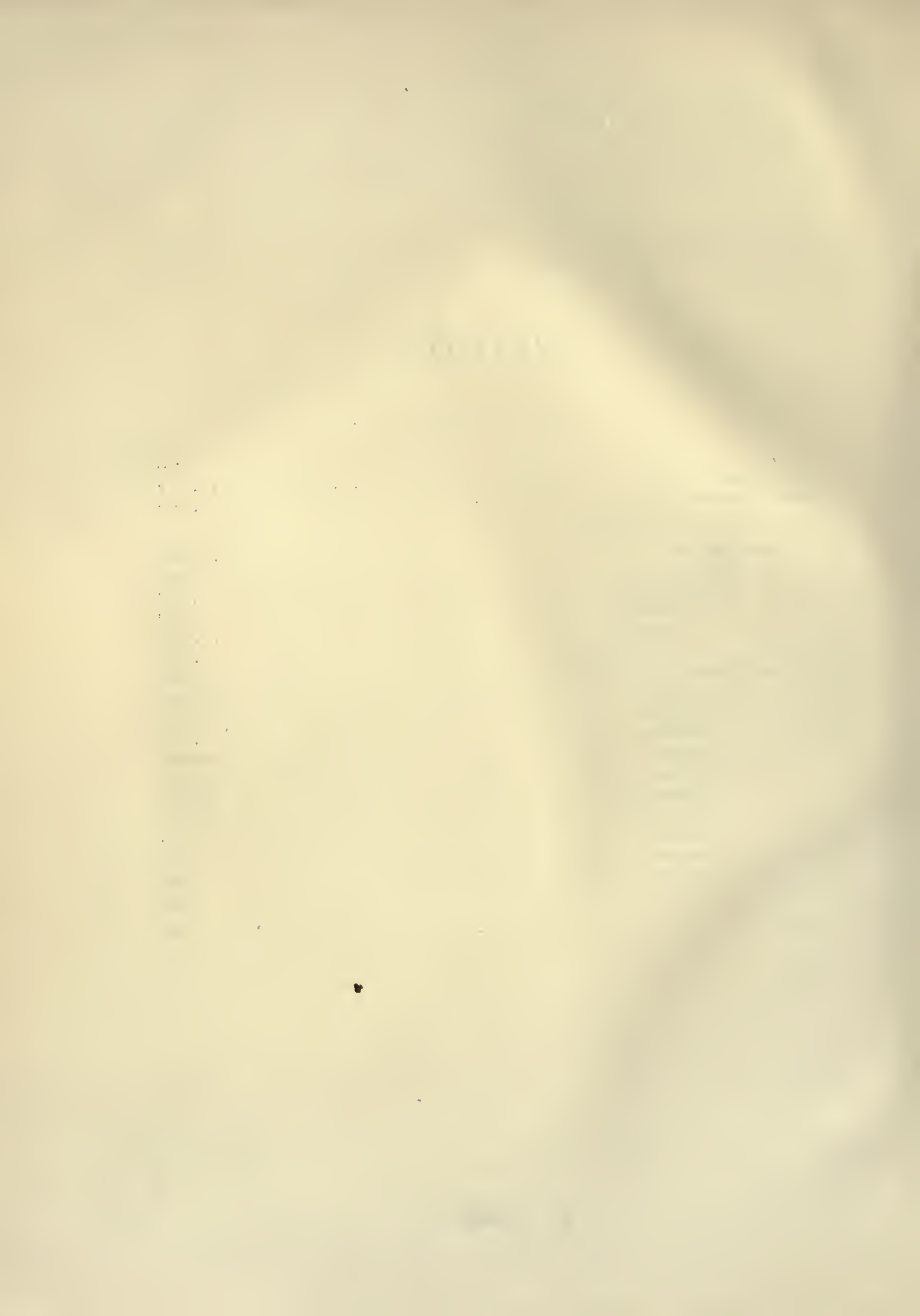
G. C. CHAMPION, F.Z.S.

1906-1909.

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INTRODUCTION.

THE present Volume, the third of this series devoted to the Rhynchophora, contains the enumeration of the species of four more groups of the subfamily Curculioninæ, viz. the Zygopina, Tachygonina, Ceuthorrhynchina, and Barina. The last-mentioned group, with which are incorporated the Ambatides, Péridinétides, and Pantotélides of Lacordaire, includes such a large number of forms that it has been considered advisable to deal with the numerous Cossonids, Calandrids, &c. in a separate volume.

The Zygopina abound in the forest-regions of Tropical America, but few species occurring north of Mexico, and the group is wholly wanting in the European fauna. It is, however, well represented in the warmer parts of the Old World. The Tropical-American genus *Cratosomus*, which includes the largest known members of the group, is characteristic of the Mexican weevil-fauna. *Piazurus*, *Zygops*, *Copturus*, *Lechriops*, &c. are remarkable from their habit of resting motionless in the hot sun on the bark of felled or decaying trees, after the manner of certain Buprestids, a fact noticed in the introductory remarks to the group. Nothing appears to have been recorded of the earlier stages of these insects.

The Tachygonina are nearly all American, and, like the Zygopina, become more numerous southward, though the number of known species is small. They are easily recognizable by their powerful and greatly elongated hind legs, which, however, are not used for jumping purposes, but for grasping the edges of leaves.

The Ceuthorrhynchina are characteristic of the north temperate portions of both hemispheres, though much more numerous in species in the Palæarctic than in the Nearctic region. They become very rare southward, doubtless, at any rate in the case

of the Ceuthorrhynchini, owing to the absence of their food-plants (certain Cruciferae, Boraginaceae, Labiatae, Compositae, &c.).

The Barina are extraordinarily numerous in genera and species throughout the greater part of the American continent. Of the eleven groups, however, under which the Central-American forms are here placed, eight do not extend north of Mexico, the other three, the Centrinides, Madarides, and Barides, being well represented in the United States, some genera—*Baris* s. str. and *Onychobaris*—becoming more numerous in species northward, and others—*Geræus* and *Pseudobaris*—increasing southward. These insects, so far as at present known, attack the stems, nuts, or fruits of various low plants, shrubs, and trees. Species of the under-mentioned genera have been observed in connection with plants of the following Natural Orders :—*Ceuthorrhynchidius* (Papaveraceae), *Ambates*, *Trichobaris*, and *Lepidobaris* (Solanaceae), *Peridinetus* (Piperaceae and Melastomaceae), *Optatus* (Anonaceae), *Geræus* (Compositae, Euphorbiaceae, and Polygonaceae), *Baris* and *Catapastinus* (Compositae), *Pseudobaris* (Labiatae), *Zygobaris* and *Amercedes* (Rutaceae), *Onychobaris* (Cactaceae), *Busckella* (Myrtaceae), *Orthoris* (Loaseae), *Nicentrus* (Euphorbiaceae and Polygonaceae), &c. ; but it is probable that in some cases the insects have simply been attracted by the flowers, especially in the case of those found upon the Anonaceae and Euphorbiaceae. The metallic European species of *Baris* are mostly attached to Cruciferae or Resedaceae, and the type of *Limnobaris* (*L. T-album*, L.)—a genus with numerous representatives in Central America—to *Cladium mariscus* (order Cyperaceae), a plant also inhabiting the warmer parts of the New World. In dealing with the three northern sections of the Barina I have found Colonel Casey's paper [Ann. N. York Acad. Sci. vi. pp. 461–684 (1892)] of great assistance, so many of the genera being common to Mexico and the United States. Some of the commoner and more widely distributed members of this group (e. g. *Baris ærea* and *Pseudobaris undulata* and *acutipennis*) are so variable that till they are bred it will probably be found impossible to define them satisfactorily.

We are again indebted to Dr. Yngve Sjöstedt for the loan of the Mexican types of the species characterized in Schönherr's work ; to Dr. K. M. Heller for communicating many types of Kirsch and Faust ; and to Signor A. Solari, of Genoa, for lending us the Barids recently described by him, and also for placing his unworked material at our disposal, allowing us at the same time to retain for the British Museum the types of the additional species recorded in this Volume. Thanks to the kindness of the Director of the Smithsonian Institution, the Mexican and Central-American Barids

belonging to the United States National Museum have been included in the present enumeration. To that gentleman also we are indebted for a set of all the N.-American forms that they had in duplicate, these having been supplemented by many others kindly supplied by Colonel Casey and Mr. H. F. Wickham. The late Professor P. Biolley, too, up to within a short time of his death, frequently forwarded to us interesting Costa Rican forms, often with notes as to food-plants, &c.

The system of publication here adopted, the only one possible by which any rapid progress could be made and the plates prepared at the same time, has prevented me from tabulating the genera of such a large group as the Barina; it would, however, have been of little use, unless the vast number of Tropical South American forms had been studied also, a task beyond the scope of this work.

Altogether 908 species are enumerated in the present volume (620 of which belong to the Barina, and 30 only to the Ceuthorrhynchina), 717 of them being treated as new, with 81 new genera. The twenty-three Plates issued, all of which have been drawn and lithographed by Mr. E. Wilson, of Cambridge, are wholly or partially coloured.

G. C. C.

April 1909.

ERRATA ET CORRIGENDA.

Page	Line	
139	9	for 1906 read 1896.
139	17	erase the words “, as in <i>Auleutes</i> .”
139	22	for <i>O. pollinosus</i> and <i>O. dietzi</i> read <i>H. pulvereus</i> and <i>H. dietzi</i> .
152	32	} for <i>Ceuthorhynchus</i> read <i>Centorhynchus</i> .
153	22	
160	32	erase sp. n.
245	2	for <i>R.</i> read <i>P.</i>
334	12	for <i>Colothus</i> read <i>Coluthus</i> .
346	27, 39	for <i>L. nasutus</i> read <i>L. nasuta</i> .
387	1	for <i>M.</i> read <i>L.</i>
395	27	for <i>Panistlahuaca</i> read <i>Panistlahuaca</i> .
467	42	for <i>B. tortilus</i> read <i>B. tortilis</i> .

BIOLOGIA CENTRALI-AMERICANA.

ZOOLOGIA.

Class INSECTA.

Order COLEOPTERA.

Tribe RHYNCHOPHORA.

Fam. CURCULIONIDÆ (continued).

Subfam. CURCULIONINÆ (continued).

Group ZYGOPINA*.

This is one of the larger groups of the Curculioninæ, and includes a vast number of Tropical-American forms, but few species occurring north of Mexico. The Zygopina are, as a rule, easily recognized by their large, exposed, finely faceted eyes, which are often so large as to occupy almost the whole of the front of the head. An important work on the American forms by Dr. K. M. Heller, of the Dresden Museum, was published in 1895 (Abhandl. Mus. Dresd. no. 11, pp. 1-70, with one plate), and his arrangement would have been followed here, were it not more convenient, to avoid delay in publication, to deal with the genera seriatim, irrespective of their inter-relationship. *Cratosomus* includes some of the largest, and *Psomus* some of the smallest, of the American Rhynchophora. Most of the species are very active and squirrel-like in their movements. Various members of the genera *Zygops*, *Copturus*, *Piazurus*, &c. have the habit, as observed by Lacordaire in Cayenne and Brazil, and by the present writer in Central America, of resting motionless in the sunshine on the trunks of dead or decaying trees. On the least alarm, however, they run rapidly round to the other side of the trunk and then drop, only to fly back again before reaching the ground to the place from which they were disturbed.

* By G. C. CHAMPION.

CRATOSOMUS.

Cratosomus, Schönherr, Cure. Disp. Meth. p. 278 (1826); Gen. Cure. iv. p. 1; Lacordaire, Gen. Col. vii. p. 145.

Gorgus, Schönherr, Cure. Disp. Meth. p. 279.

A Tropical-American genus, including many species of large size, a few of which are peculiar to the region now under investigation: *C. punctulatus* is a common insect in Mexico, but the others are all rare or local, with the exception of *C. gemmatus*. Some of the South-American forms belonging to Schönherr's second group have a long curved spine on each side of the rostrum in the male, in which sex also the pygidium is more broadly exposed than in the female, whereas in *C. punctulatus* and other members of his first group the pygidium is broadly exposed in both sexes. Fresh examples of certain species, *C. pulverulentus*, &c., are coated with a mealy secretion, as in *Lixus*, *Larinus*, &c.

a. Femora unidentate, the anterior pair sometimes unarmed.

a¹. Rostrum short, feebly curved, not dentate at the sides in the ♂; eyes comparatively small, distant; femora sharply annulate; pygidium broadly exposed in both sexes.

a². Prothorax and elytra sparsely, conspicuously tuberculate; the pallid vestiture of the prothorax reduced to two patches at the base and a line along the anterior margin *annulipes*, sp. n.

b². Prothorax not or feebly, and the elytra distinctly *, tuberculate; the pallid vestiture of the prothorax separating or surrounding the usually more or less confluent black spots on the disc *punctulatus*, Gyll.

c². Prothorax not, and the elytra sparsely, tuberculate; the prothorax with a transverse black median fascia, the rest of the vestiture dense and yellowish *lafontii*, Guér.

b¹. Rostrum longer and more curved, sometimes feebly dentate at the sides in the ♂; eyes very large, subcontiguous or narrowly separated; femora not annulate; pygidium of the ♂ broadly, and that of the ♀ narrowly, exposed †.

d². Prothorax and elytra finely tuberculate *gemmatus*, Lec.

e². Prothorax and elytra with long, stout, conical tubercles, the elytra bidentate at the apex *spicatus*, sp. n.

f². Prothorax granulate or punctate ‡.

a³. Elytra with a very large conical tubercle on the third interstice and another large tubercle at the shoulder.

a⁴. Prothorax granulate; elytra seriato-foveolate *augustus*, sp. n.

b⁴. Prothorax punctate; elytra seriate-punctate *pulverulentus*, sp. n.

* The tubercles few in number in the var. *η*.

† The two sexes of *C. gemmatus* and *C. cuneatus* only are available for examination.

‡ In *C. aspersus* there is a short tuberculiform carina on the disc.

- b*³. Elytra with scattered flattened tubercles along each alternate interstice; prothorax immaculate *aspersus*, sp. n.
- c*³. Elytra with, at most, an oblong bare prominence on each alternate interstice below the base; prothorax spotted *cuneatus*, sp. n.
- b*. Femora bidentate; prothorax with two, and the elytra with many, small tubercles on the disc, the elytra bidentate at the apex; pygidium (♂) broadly exposed *bidens*, sp. n.

1. *Cratosomus annulipes*, sp. n. (Tab. I. figg. 1, 1 *a*.)

Oblong-ovate, rather broad, black, opaque above (the tubercles excepted), moderately shining beneath; the head between the eyes, the prothorax with the anterior margin, the lower part of the flanks, and a patch on each side at the base, the scutellum, and the elytra with three broad, more or less connected, transverse, irregular fasciæ, the anterior one connected with an oblique humeral streak, thickly clothed with yellowish- or fulvo-cinereous, piliform scales, the rest of the upper surface black; the under surface, femora, and tibiæ rather sparsely clothed with narrow yellowish-cinereous scales, the femora conspicuously annulate near the tip, the tarsi thickly clothed above with similarly-coloured hairs. Head finely punctate, broadly sulcate between the somewhat widely separated eyes, the groove extending upwards on to the vertex; rostrum almost straight, broad, flattened, rugulosely punctate and subcarinate, smooth at the tip. Prothorax transverse, rapidly narrowed from the middle; closely, minutely punctate, the disc broadly depressed in the centre, shortly carinate, and with several scattered, smooth, rounded tubercles. Elytra much wider than the prothorax, narrowing from a little below the base, the humeri swollen, the apices obtuse; finely punctate-striate, the interstices minutely punctate, flat, 1, 3, 5, and 7 with scattered, smooth, rounded, subconical tubercles, the one near the base of 3 larger than the others. Beneath closely, finely punctate; ventral segment 1 broadly depressed down the middle in the ♂. Pygidium broadly exposed beneath in both sexes, with a short longitudinal carina at the tip. Femora clavate, each with a short tooth.

Length 20–22, breadth 9–10 millim. (♂ ♀.)

Hab. COSTA RICA (*Van Patten*), Miravalles (*Underwood*), Azahar de Cartago (*Biolley*); PANAMA, Chiriqui (*Trötsch*).

Five specimens. A close ally of the very variable *C. punctulatus*, but with fewer and much more conspicuous tubercles on the elytra; the prothorax with several scattered tubercles on the disc, the pallid vestiture of its upper surface reduced to two patches at the base and a line along the apical margin.

2. *Cratosomus punctulatus*. (Tab. I. figg. 2, 2 *a*; 3–7, vars.)

Cratosomus punctulatus, Gyll. in Schönh. Gen. Curc. iv. p. 6¹; viii. 1, p. 294².

Cratosomus mexicanus, Gyll. loc. cit. p. 5³.

Cratosomus pustulatus, Gyll. loc. cit. p. 7⁴.

Cratosomus nodieri, Gyll. loc. cit. p. 8⁵.

Hab. MEXICO^{1 2} (*ex coll. Sturm*^{3 4}; *Truqui*; *Mus. Brit.*), Alamos in Chihuahua (*Buchan-Hepburn*), Ciudad in Durango (*Forrer*), Durango (*ex coll. Flohr*), Guadalajara, Tacambaro, Jalapa (*Höge*), Mochitlan (*Baron*), Matamoros Izucar, Cuernavaca (*Sallé*, *Höge*), Chilpancingo (*Höge*, *H. H. Smith*), Rincon, Amoqueleca, Amula, and Tierra Colorada in Guerrero (*H. H. Smith*), Guanajuato, Mirador, Capulalpam, Parada, Juquila, Etla, Oaxaca (*Sallé*), Valladolid (*Mus. Brit.*), between Oaxaca and Acapulco⁵;

BRITISH HONDURAS * (*H. A. Wickham, Mus. Brit.*); NICARAGUA, Chontales (*Belt, Janson*).—COLOMBIA; VENEZUELA; TRINIDAD (*Mus. Brit.*); ECUADOR.

This very variable species (of which I have seen about 100 examples) is a common insect in Mexico, ranging as far north as Chihuahua and extending southward to Trinidad and Ecuador. Schönherr, in his later work², selected the name *C. punctulatus* for it, sinking *C. mexicanus* and *C. pustulatus* as varieties, and to these must also be added *C. nodieri* and other Mexican forms. They are all connected by intermediate examples and may be roughly defined thus:—

- α. The prothoracic spots usually more or less coalescent; the elytra nigro-bifasciate, the tubercles large and somewhat closely placed. (Fig. 2.)

Cratosomus punctulatus, Gyll. loc. cit.

Cratosomus glandulosus, Chevr. in litt.

Mexico, widely distributed and apparently the commonest form there; Colombia.

- β. The prothorax with ten or twelve separate spots; the elytra at most irregularly nigro-fasciate at the middle, the tubercles large. (Fig. 3.)

Cratosomus punctulatus, var. *β. mexicanus*, Schönh. loc. cit.

Cratosomus subfasciatus, Chevr. in litt.

Mexico (Vera Cruz, Guerrero, Oaxaca), British Honduras, Nicaragua, Trinidad, Venezuela, Ecuador.

- γ. The prothorax usually more rounded at the sides, and often with a few tubercles on the disc, the spots more or less confluent; the elytra nigro-bifasciate, with the whitish vestiture reduced to a network of transverse confluent spots, the tubercles large. (Fig. 4.)

Cratosomus punctulatus, var. *γ. pustulatus*, Schönh. loc. cit.

Cratosomus sallæi and *rotundicollis*, Chevr. in litt.

Mexico—Vera Cruz, Morelos, Guerrero, Oaxaca.

- δ. The spots on the prothorax not quite confluent, separated by a network of whitish lines; the elytra as in γ. (Fig. 5.)

Cratosomus nodieri, Gyll., Schönh.

Cratosomus mæstus, Jekel, in litt.

Mexico—between Acapulco and Oaxaca.

- ε. The prothorax with from 10–12 spots, the basal two sometimes united, as well as the three on the flanks; the elytra as in α, but with broader black fasciæ. (Fig. 6.)

Cratosomus 7-maculatus, Chevr. in litt.

Mexico—Durango, Vera Cruz, Oaxaca (three examples) †.

- ζ. The prothoracic spots confluent; the elytra as in ε.

Cratosomus corectus, Chevr. in litt.

Mexico—Oaxaca (two examples).

* This specimen is labelled Temash R., Brit. Honduras; perhaps in mistake for Temax, Yucatan?

† There is an example of this form in the British Museum labelled "Brazil," but there must be some mistake about this locality.

- η. The prothorax with three or four spo's (one or two on the disc at the base and one on each flank); the elytra sharply nigro-bifasciate, the rest of their surface with a dense, white or yellowish vestiture, the tubercles small and few in number. (Fig. 7.)

Mexico—Chihuahua and Durango (four examples).

The pygidium is broadly exposed beneath in both sexes, which are scarcely distinguishable by external characters, though the rostrum in some of the larger males is carinate to near the tip. The femora are always cinereo-annulate towards the apex; the anterior pair are sometimes unarmed. The length varies from 13–23 and the breadth from $5\frac{4}{5}$ –11 millimetres. The three specimens (of the var. β) from Trinidad, in the British Museum, appear to have been found in the Botanic Gardens there, and they may have been introduced in some way from Mexico.

3. *Cratosomus lafontii*. (Tab. I. fig. 8.)

Cratosomus lafontii, Guér. Icon. Règne Anim., Ins. p. 163¹.

Hab. PANAMA (*Conradt*).—COLOMBIA¹; BRAZIL.

We have a single specimen of this insect supposed to have been taken at Panama, agreeing with another from Colombia in our collection. It is easily recognized by its dense yellowish vestiture and sparsely tuberculate elytra; the prothorax with a broad, transverse, black median fascia (interrupted at the middle in the two examples before me), the elytral tubercles (that near the base of the third interstice and the one on the shoulder larger than the rest) almost bare. The rostrum is broad, flattened, and almost straight, finely punctate and obsoletely carinate in its basal half. The eyes are widely separated and the interocular space flattened. The pygidium is large and broadly exposed beneath. The femora are conspicuously annulate near the tip.

4. *Cratosomus gemmatus*. (Tab. I. figg. 9, 9 a–c, ♂; 10, ♀.)

Cratosomus gemmatus, Lcc. Proc. Acad. Phil. 1858, p. 79¹.

Hab. MEXICO, Tampico in Tamaulipas (*Haldeman*¹), Juquila (*Sallé*), Amatan in Chiapas (*Flohr*); GUATEMALA, Panima in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt, Janson*); PANAMA, Bugaba (*Champion*), Chiriqui (*Trötsch*).

Of this species, described from a single specimen from N.E. Mexico, we have received eleven examples, including both sexes. It is the only Central-American *Cratosomus* with the disc of the prothorax and each of the elytral interstices studded with small shining tubercles, which, however, are sometimes much reduced in number on the prothorax. The eyes are very large, narrowly separated or subcontiguous. The rostrum is rather long and arcuate, widened, depressed, and carinate at the base, and sometimes feebly dentate at the sides in the male. The pygidium of the male is broadly, and that of the female narrowly, exposed beneath. The sculpture of the

under surface is variable. Fresh specimens have a broad, transverse, subquadrate patch at the base of the prothorax, and a large patch on the shoulders of the elytra clothed with cinereous scales.

5. *Cratosomus spicatus*, sp. n. (Tab. I. figg. 11, 11 a.)

Subovate, black, the head and prothorax (the tubercles excepted) opaque, the rest of the surface shining; sparsely clothed with minute or small, flavo-cinereous, piliform scales, which are partly hidden by a fulvous mealy secretion. Head minutely punctate, sulcate down the middle in front, the eyes very large and subcontiguous; rostrum very stout, arcuate, reaching the metasternum, depressed at the sides towards the base, sparsely, finely punctate, smooth at the tip. Prothorax transverse, abruptly narrowed and feebly constricted in front; sparsely, minutely punctate, with three stout, erect, conical tubercles placed in a transverse series across the middle of the disc, and a cluster of four stout tubercles in a line with them on each lateral margin. Elytra much wider than the prothorax, rather long, subtriangular, bidentate at the apex; rather coarsely seriate-punctate, the punctures becoming much finer towards the tip, the interstices 3, 5, and 7 each with from 2-4 widely separated, very stout, long, conical tubercles, 8 with a single similar tubercle at the shoulder, and 10 with a row of four smaller tubercles below the base. Beneath sparsely, very finely punctate; fifth ventral segment foveate in the middle. Pygidium arcuate and narrowly exposed beneath. Femora clavate, the anterior pair feebly, the others sharply, unidentate.

Length $24\frac{1}{2}$, breadth $12\frac{1}{2}$ millim. (♀.)

Hab. COSTA RICA, Azahar de Cartago (*Underwood*).

One specimen. Near the S.-American *C. taurus*, *C. vaginalis*, and *C. varicosus*, but different from them in having the very long, conical tubercles on the elytra widely scattered over the surface (two on the shoulder and seven on the disc of each elytron), and the prothorax with three large conical tubercles on the disc and a cluster of four others on each side. The apices of the elytra are each produced into a long stout tooth.

6. *Cratosomus augustus*, sp. n. (Tab. II. figg. 1, 1 a.)

Oblong-ovate, black, shining; above sparsely clothed with small reddish-brown and fulvo-cinereous scales, which are condensed into transverse fasciæ on both the prothorax and the elytra (two on the prothorax—one at the apex and the other behind the middle—and three on the elytra—one before, and another beyond, the middle, and one near the apex); the vestiture of the under surface very scattered. Head closely punctate, carinate between the rather narrowly separated eyes; rostrum very stout, arcuate, rugulosely punctate at the base. Prothorax transverse, rounded at the sides, constricted and much narrowed in front, and also narrowed behind; minutely punctate and sparsely granulate, the granules becoming stouter and tuberculiform at the sides before the middle, the disc with a short median carina. Elytra considerably wider than the prothorax, moderately elongate; seriate-foveolate, the squamose transverse spaces depressed and with smaller punctures, the third interstice with a very large smooth tubercle near the base, and the shoulders also with a large laterally projecting tubercle, the apices obtusely dentate. Fifth ventral segment broadly sulcate down the middle. Pygidium rather broadly exposed beneath. Femora clavate, unidentate.

Length $17\frac{1}{2}$, breadth $7\frac{1}{8}$ millim. (♂.)

Hab. PANAMA, Chiriqui (*Trötsch*).

One specimen, obtained from the dealer H. Rolle of Berlin, under the MS. name of *C. augustus*, Faust. A close ally of *C. pulverulentus*, but narrower and more oblong in

shape, the prothorax and elytra fasciate, the prothorax narrowed behind and granulate on the disc, the elytra interruptedly seriato-foveolate.

7. *Cratosomus pulverulentus*, sp. n. (Tab. I. figg. 12, 12 a.)

Subovate, shining, black; sparsely clothed with minute or small, cinereous, piliform scales, which are partly hidden by a somewhat dense, ferruginous, mealy secretion. Head closely punctate, carinate between the large, rather narrowly separated eyes, the vertex shallowly sulcate; rostrum very stout, strongly arcuate, depressed at the sides towards the base, rugulose punctate, becoming much smoother beyond the middle. Prothorax transverse, constricted and much narrowed in front, the sides arcuately converging from the middle; densely, minutely punctate, except along a smooth narrow median line, without trace of tubercles. Elytra moderately long, subtriangular, much wider than the prothorax; rather coarsely seriate-punctate, the interstices closely, minutely punctate, 3 with an exceedingly large, smooth, conical tubercle below the base, 8 with a large, outwardly-directed, conical tubercle at the shoulder, and 9 with a smaller tubercle below it, the disc transversely swollen and a little smoother across the middle and less distinctly so towards the apex, the apices slightly swollen. Beneath very shining, finely punctate; ventral segments 1 and 5 deeply sulcate down the middle. Pygidium rather broadly exposed beneath. Femora clavate, unidentate.

Length 21, breadth 9 millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*), Chiriqui (*Trötsch*).

Two males, one with the rusty-red mealy secretion almost covering the depressed portions of the elytral surface. The tubercle below the base of the third elytral interstice is very large, and the outwardly-directed conical tubercle at the shoulder is also large and prominent. *C. pulverulentus* approaches the S.-American *C. varicosus*.

8. *Cratosomus aspersus*, sp. n. (Tab. I. figg. 13, 13 a.)

Elliptic, black, thickly clothed with small, piliform, fulvo-cinereous scales, the tubercles bare. Head closely, very finely punctate, sulcate between the very large, narrowly separated eyes; rostrum arcuate, depressed and closely punctate at the base. Prothorax transverse, rapidly narrowed from the middle forwards; dull, closely, minutely punctate, with a small, oblong, shining tubercle on the disc towards the apex. Elytra much wider than the prothorax, rather long, subtriangular, obtusely bidentate at the tip, the humeri prominent; somewhat deeply striate, the striae with oblong, subquadrate, moderately coarse, approximate punctures, the interstices closely, minutely punctate, 1, 3, 5, and 7 with numerous, and the others with one or more, large, flattened, smooth, scattered tubercles. Beneath shining, very finely punctate; ventral segment 5 depressed down the middle. Pygidium arcuate and narrowly exposed beneath. Femora clavate, each with a short tooth. Intermediate and posterior tibiae strongly sinuate.

Length $24\frac{1}{2}$, breadth $10\frac{3}{4}$ millim. (♀.)

Hab. PANAMA, Chiriqui (*Trötsch*).

One example. Near the Brazilian *C. bos*, Gyll., but with the elytral tubercles more numerous and smaller and the apical teeth shorter. There is a specimen from Ibagué, Colombia, in the British Museum, that probably belongs to the same species: it has the vestiture yellower and on the prothorax condensed into a broad, transverse, interrupted, subquadrate patch at the base.

9. **Cratosomus cuneatus**, sp. n. (Tab. I. figg. 14, 14 a; 15, var.)

Elongate-rhomboidal, shining, black; thickly clothed above with small, piliform, cinereous scales, the prothorax with two large spots on the disc and another on each flank, and the elytra with the shoulders and various irregular spots and sinuous transverse streaks, black; the vestiture of the femora, tibiae, and under surface very sparse and fine. Head finely punctate, broadly sulcate between the somewhat widely separated eyes, the groove extending upwards on to the vertex; rostrum strongly arcuate, flattened, finely punctate, and subcarinate towards the base, the antennae inserted at about the middle. Prothorax subconical, a little broader than long, slightly constricted in front; densely, minutely punctate, obsoletely carinate anteriorly. Elytra much wider than the prothorax, elongate-triangular, conjointly rounded at the apex; coarsely punctate-striate, the interstices minutely punctate, somewhat convex, flat at the tip. Beneath very finely punctate; ventral segment 5 foveate in the ♀, and with a deep transverse depression in the ♂. Pygidium of the ♂ broadly, that of the ♀ narrowly, exposed beneath. Femora clavate, each with a short tooth.

Var. Prothorax with two black spots on each flank, the dorsal spots a little smaller; the elytra, except towards the apex, with the black partly denuded spaces more elongate and slightly raised, clustered into two irregular transverse fasciae (one at, and the other before, the middle), the interstices 3 and 5 each with an oblong bare prominence below the base. (Fig. 15.)

Length 17-19, breadth 7-8 millim. (♂ ♀.)

Hab. GUATEMALA, Cerro Zunil (*Champion*); COSTA RICA, Azahar de Cartago (*Underwood*).

A pair from Guatemala and a female from Costa Rica, the latter belonging to the varietal form. This insect may be recognized by its rather narrow, elongate-rhomboidal form, the irregular black patches on the elytra, the strongly curved rostrum, &c. There are no definite tubercles on either the prothorax or the elytra, though the alternate interstices of the latter are sometimes raised below the base.

10. **Cratosomus bidens**, sp. n. (Tab. I. figg. 16, 16 a; 16 b, anterior leg.)

Subovate, black, opaque above, slightly shining beneath; the head, the prothorax with the base, a small spot on the flanks, and an oblong patch near each hind angle, the scutellum, and the elytra with a transverse humeral patch (extending inwards to the scutellum), thickly clothed with narrow, piliform, cinereous scales; the rest of the upper surface with scattered minute scales, the vestiture of the legs and under surface closer, longer, and cinereous. Head closely, minutely punctate, the eyes very large and subcontiguous; rostrum arcuate, finely punctate, becoming much smoother towards the tip. Prothorax transverse, flattened on the disc posteriorly, much narrowed in front; closely, minutely punctate, the disc with a small tubercle on each side at about the middle. Elytra moderately long, subtriangular, bidentate at the apex; punctate-striate (the punctures coarse, deep, and oblong, smaller at the base and towards the apex), the dorsal interstices with scattered smooth conical tubercles, which are most numerous on 1 and 3, the shoulders also tuberculate beneath. Beneath finely punctate; ventral segment 5 depressed down the middle posteriorly. Pygidium broadly exposed beneath. Femora bidentate, the teeth distant one from another, the inner tooth on the intermediate and posterior pairs rather large. Tibiae strongly sinuate.

Length $23\frac{1}{2}$, breadth $11\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Chiriqui (*Trötsch*).

One specimen, assumed to be a male. Near *C. dejeani*, Gyll. (= *bombina*, Oliv., Herbst), but with the femora bidentate, the elytral tubercles almost confined to the dorsal region (inconspicuous on the shoulders and more numerous along the suture),

the seriate punctures oblong, &c. The smoother prothorax, &c., distinguish it from *C. gemmatus*. No species with bidentate femora is mentioned in Schönherr's work.

PIAZURUS.

Zygops, subgen. *Piazorus*, Schönherr, Curc. Disp. Meth. p. 303 (1826).

Piazurus, Schönherr, Gen. Curc. iv. p. 651 (1837); Lacordaire, Gen. Col. vii. p. 147; Heller, Abhandl. Mus. Dresden, no. 11, pp. 3, 4 (1895); Stett. ent. Zeit. 1906, pp. 31, 32 (nec Leconte).

A Tropical-American genus including numerous species*, mostly of large size, several of which are abundant within our region. They are elliptic, rhomboidal, or subovate in shape, and have the femora clavate—the posterior pair very stout and armed with a large triangular tooth, the others usually with a small tooth,—the eyes large, oval, and contiguous or narrowly separated, the second joint of the funiculus, and usually the third also, elongate, the mesosternum excavate and rather long, and the pygidium narrowly exposed. The fifth ventral segment is more or less rounded at the apex in the female, and sinuato-truncate or emarginate in the male. The Central-American species, for some of which Dr. Heller has proposed two subgenera, may be tabulated thus:—

- A. Ventral segments distinctly ascending, 2 at the sides about as long as 3 and 4 united; all the femora toothed. Posterior tibiæ mucronate or not at the inner apical angle. [PIAZURUS, s. str.]
- a. Joint 2 of the funiculus as long as, or one-half longer than, 3; prothorax conical or subconical.
- a¹. Elytra emarginate or truncate at the apex.
- a². Prothorax trifovate on the disc.
- a³. Elytra with a sharply-defined, saddle-shaped, black median fascia, the prominences obsolete *trifoveatus*, sp. n.
- b³. Elytra with a common, irregular, cinereous patch occupying the depressed space on the disc, the prominences black and conspicuous *plagiatus*, sp. n.
- b². Prothorax without depressions on the disc.
- c³. Elytra with a very large conical tubercle near the base of the third interstice; prothorax with a broad arcuate band, and the elytra with a common saddle-shaped patch or fascia, black *caprimulgus*, Oliv.
- d³. Elytra with a smaller prominence or tubercle at or near the base of the third interstice.
- a⁴. Prothorax and elytra with numerous small ochreous spots *spretus*, Heller.

* It is probable that a number of those described by Boheman will have to be sunk, to judge from the great variability of *P. maculipes*.

- b*⁴. Prothorax and elytra with a few small ochreous or whitish spots *helleri*, sp. n.
- c*³. Elytra with the third interstice usually more or less swollen or widened at the base and middle, the basal prominence often tuberculiform, the transverse depression conspicuous.
- c*⁴. Prothorax and elytra variegate, the raised or widened portions of the third elytral interstice black or brown.
- a*⁵. Ventral segments almost uniformly punctured and squamose, with coarser whitish scales intermixed . . . { *succivus*, Boh.
[*notabilis*, Boh.].
- b*⁵. Ventral segments with a broad, smoother, almost bare space down the middle, the lateral portions densely, uniformly squamose.
- a*⁶. Prothorax and elytra feebly sinuate at the base, the elytral prominences sometimes wanting . . . { *maculipes*, Gyll.
[*saginitus*, Boh.].
- b*⁶. Prothorax and elytra strongly sinuate at the base, the basal prominence on the third elytral interstice large and oblong *ciliatus*, Germ.
- d*⁴. Prothorax with the sides broadly pale, the elytra with a post-median, cinereous fascia preceded by a transverse velvety-black patch *pallidicinctus*, sp. n.
- f*³. Elytra flattened on the disc, the third interstice without prominences; prothorax and elytra with a few scattered yellow spots *sulphuriventris*, Heller.
- b*¹. Elytra rounded at the apex.
- c*². Elytra shorter, rounded-triangular, with a very large, common, rounded, velvety-black patch on the disc *stigmaticus*, sp. n.
- d*². Elytra longer, subtriangular, each with an oblong velvety-black patch on the disc, preceded and followed by a small whitish spot *melanostictus*, Boh.
- b*. Joint 2 of the funiculus twice as long as 3; elytra variegate, obtuse at the apex; prothorax rounded at the sides; elytra rounded-triangular, the alternate interstices raised, not granulate. *alternans*, Kirsch.
- B. Ventral segments not or slightly ascending, 2 at the sides shorter than 3 and 4 united.
- a*. Posterior tibiae mucronate at the inner apical angle.
- a*¹. All the femora toothed; the first ventral suture almost straight. [Subgen. PSEUDOPINARUS, Heller.]
- a*². Joint 2 of the funiculus twice as long as 3; prothorax with the sides parallel behind; elytra subtriangular, the interstices with setigerous granules, 3 strongly binodose; first ventral segment without curved groove *condyliatus*, Boh.
- b*². Joint 2 of the funiculus nearly three times as long as 3; prothorax subconical, with a large prominence on the middle of the disc; elytra subquadrate, granulate and nodose; first ventral segment with a shallow arcuate groove *rana*, Heller.

- b*¹. Anterior femora unarmed; joints 2 and 3 of the funiculus subequal in length; prothorax very short, with the sides parallel behind; elytra subquadrate, nodose and granulate, the transverse depression deep, the apices rounded; first ventral segment deeply grooved on each side between the coxæ, the first suture strongly arcuate; posterior legs very stout . . . *quadratus*, sp. n.
- b*. Posterior tibiæ sharply mucronate on the inner edge before the apex; posterior femora only dentate; prothorax conical; elytra with the interstices narrow, seriato-granulate, the apices emarginate; joint 2 of the funiculus about twice as long as 3; first ventral segment with a deep Ω -shaped groove. [Subgen. PSEUDOPIAZURUS, Heller (part.).] . . . *centrali-americanus*, [Heller.]

1. *Piazurus trifoveatus*, sp. n. (Tab. I. fig. 17.)

Subrhomboidal, black, the antennæ obscure ferruginous; the vestiture of the prothorax and elytra fulvous or brown, slightly mottled with cinereous, that of the head, scutellum, under surface, and legs almost entirely cinereous; the prothorax with two spots at the base, some markings along the middle of the disc, and an oblique marginal vitta, and the elytra with a more or less excised, broad, median fascia (extending upward to the shoulders and downward along the suture), a large patch at the sides posteriorly, and some irregular markings around the scutellum, velvety-black, the median fascia sometimes preceded by several white spots, the femora subannulate. Head densely, minutely punctate, the eyes subcontiguous; rostrum densely punctate and carinate at the base, and smooth thence to the tip; joint 2 of the funiculus about one-half longer than 3. Prothorax transverse, subconical, with two large shallow depressions on the middle of the disc and one in the centre in front; densely, minutely punctate and also carinate. Elytra very much wider than the prothorax, rounded-triangular, transversely depressed below the base, the humeri swollen, the apices sharp, obliquely truncated; punctate-striate, the seriate punctures rather coarse on the basal half, the interstices minutely punctate, almost flat on the disc. Beneath closely, finely punctate; ventral segment 1 broadly depressed down the middle in both sexes, 5 sinuato-truncate, and also feebly foveate, at the apex in the ♂.

Var. The black markings on the prothorax almost obsolete, the depressions indistinct.

Length $9\frac{1}{10}$ – $12\frac{2}{3}$, breadth $4\frac{3}{4}$ – $6\frac{1}{5}$ millim. (♂ ♀.)

Hab. COSTA RICA, Savanillas de Pirris (*Underwood*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Eleven specimens, all but one from Chiriqui, and one only with the depressions on the prothorax indistinct. This insect has the elytra marked as in *P. caprimulgus*, and the prothorax shallowly trifoveate as in *P. plagiatus*. The elytra are without tubercles on the disc. The Costa Rican example is figured.

2. *Piazurus plagiatus*, sp. n. (Tab. I. fig. 18.)

Piazurus plagiatus, Chevr. in litt.

Piazurus triangulum, Jekel, in litt.

Subrhomboidal, black or piccous, the antennæ and the tips of the tarsi obscure ferruginous; variegated above with minute fulvous, cinereous, and black scales—the cinereous scales usually condensed into a large, interrupted, transverse patch on the depressed portion of the disc of the elytra and various scattered spots or streaks, the black scales also condensed into spots and streaks (especially around the cinereous dorsal patch, behind which there is always a spot on the swollen portion of the third interstice), and sometimes into a marginal vitta on the prothorax; the under surface also variegate with cinereous (or

white), fulvous, and dark brown, the whitish scales often condensed into rows of spots; the legs cinereous, the femora fusco-annulate. Head densely, minutely punctate, the eyes subcontiguous; rostrum closely punctate and carinate at the base, almost smooth in its outer half; joint 2 of the funiculus considerably longer than 3. Protherax transverse, subconical, with two large shallow depressions on the middle of the disc and one in the centre in front; densely, minutely punctate and feebly carinate. Elytra very much wider than the protherax, rounded-triangular, broadly transversely depressed below the base, the humeri swollen, the apices each produced into a blunt triangular tooth; punctate-striate, the punctures rather coarse on the basal half, the third and fourth striae strongly sinuate, the interstices densely, minutely punctate, 3 swollen and dilated at the middle. Beneath closely, finely punctate; ventral segment 1 broadly depressed down the middle, 5 sinuato-truncate at the apex in the ♂.

Length $8\frac{1}{2}$ – $11\frac{1}{2}$, breadth $4\frac{1}{2}$ – $6\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*), Cerro de Plumas (*Höge*), Teapa (*H. H. Smith*); GUATEMALA, Panzos and Panima in Vera Paz, San Isidro, Cerro Zunil, Las Mercedes (*Champion*); NICARAGUA, Chontales (*Belt, Janson*); COSTA RICA, San José (*Biolley*).

This insect is distributed in collections under Chevrolat's MS. name. It varies greatly in the colour of the vestiture, the cinereous scales being sometimes mainly condensed into a large patch on the disc of the elytra, and sometimes into numerous spots or streaks. From *P. trifoveatus*, the only other Central-American form with a trifoveate prothorax, the present species may be separated by the non-fasciate elytra and the oblong prominence on the third interstice.

3. *Piazurus caprimulgus*. (Tab. I. figg. 19, 19 a; 20, 21, vars.)

Rhynchænus caprimulgus, Oliv. Ent. v. no. 83, p. 177, t. 17. fig. 209¹.

Piazurus caprimulgus, Schönh. Gen. Curc. iv. p. 679²; Heller, Stett. ent. Zeit. 1906, p. 33³.

Hab. MEXICO, Toxpam and Santecomapan in Vera Cruz (*Sallé*); BRITISH HONDURAS (*Blancaneaux*); NICARAGUA (*Sallé*), Chontales (*Belt, Janson, Richardson*); COSTA RICA, Reventazon, Santa Clara (*Biolley*), Miravalles (*Underwood*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—COLOMBIA; GUIANA, Cayenne²; AMAZONS.

Found in abundance at Bugaba and in some numbers at Chontales. Three forms occur in Central America:—

α. The prothorax and elytra with small scattered white spots, those on the elytra mostly placed along the edges of the black markings. (Fig. 19.)

Costa Rica (Miravalles), Panama, and S. America.

β. The black saddle-shaped patch on the elytra larger and extending up the suture to near the base, the white spots behind it larger and more or less coalescent, those on its anterior edge very small and inconspicuous. (Fig. 20.)

Mexico and British Honduras.

γ. The black saddle-shaped patch on the elytra less indented along its anterior and posterior edges, the white spots almost obsolete and altogether wanting on the protherax. (Fig. 21.)

Piazurus transversus, Faust, in litt.

Nicaragua and Costa Rica (Reventazon, Santa Clara).

P. caprimulgus is easily recognizable by the very large conical tubercle near the base

of the third elytral interstice, the broad, transverse, arcuate, black fascia on the prothorax, and the saddle-shaped black fascia below the middle of the elytra, the outer portion of this latter usually extending forward to the shoulder. The apex of each elytron is produced into a rather long tooth, the intervening space being truncate. The second joint of the funiculus is a little longer than the third. The length varies from $8\frac{1}{2}$ –14 millimetres. The var. γ appears to be distributed in collections under the MS. name *P. transversus*, Faust.

4. *Piazurus spretus*. (Tab. I. fig. 22.)

Piazurus spretus, Heller, Stett. ent. Zeit. 1906, pp. 33, 39¹.

Subrhomboidal, black, the antennæ and the tips of the tarsi ferruginous; the head with an ochreous line around the eyes, and the prothorax and elytra with numerous small, similarly-coloured spots, the rest of the vestiture of the upper surface uniformly dark brown, that of the under surface and legs close and cinereous, the femora faintly annulate. Head densely, minutely punctate, the eyes subcontiguous; rostrum densely punctate and carinate at the base, and almost smooth thence to the tip; joint 2 of the funiculus a little longer than 3. Prothorax strongly transverse, subconical, constricted in front, deeply sinuate at the base; densely, minutely punctate and sometimes obsolete carinate. Elytra very much wider than the prothorax, rounded-triangular, the humeri swollen, but not prominent, the apices rather sharp, obliquely truncated; punctate-striate, the interstices minutely punctate, more or less convex, except at the tip, 3 with an oblong prominence at the base. Beneath closely, very finely punctate, the depressed space down the middle of the first ventral segment smoother, the fifth segment slightly sinuate at the apex in the σ .

Length $9\frac{1}{2}$ – $12\frac{1}{2}$, breadth $4\frac{4}{5}$ – $6\frac{4}{5}$ millim. (σ φ .)

Hab. ? GUATEMALA (*Mus. Brit.*); NICARAGUA (*Sallé*¹), Chontales (*Belt, Janson, Richardson*).

We have received eleven specimens of this species from Nicaragua. It may be easily recognized by the numerous small ochreous spots on the upper surface, and the rather convex elytral interstices, the third with a conspicuous prominence at the base; the elytral spots are mostly divided by the striæ.

5. *Piazurus helleri*, sp. n. (Tab. I. figg. 23, 23 a.)

Subrhomboidal, black, the antennæ and the tips of the tarsi ferruginous; the head with a line around the eyes, and the prothorax and elytra with various small scattered spots, cinereous or ochreous, the rest of the vestiture of the upper surface uniformly dark brown, that of the under surface (a broad almost smooth space down the middle excepted) and legs close, cinereous or flavo-cinereous, the femora fusco-annulate. Head densely, minutely punctate, the eyes subcontiguous; rostrum carinate and closely punctate at the base, and almost smooth thence to the tip; joint 2 of the funiculus considerably longer than 3. Prothorax transverse, conical, feebly constricted in front; densely, minutely punctate. Elytra very much wider than the prothorax, rounded-triangular, transversely depressed below the base, the humeri swollen, the apices rather sharp, obliquely truncated; finely striate, the striæ with scattered punctures, the dorsal interstices flat, 3 with a large conical tubercle below the base. Beneath closely, finely punctate, smoother and almost bare down the middle; ventral segment 1 broadly sulcate, 5 sinuate-truncate at the apex in the σ .

Length 10–12, breadth $5\frac{1}{2}$ – $6\frac{1}{2}$ millim. (σ φ .)

Hab. GUATEMALA, Panzos in the Polochic Valley (*Champion*); NICARAGUA, Chontales (*Belt, Janson*).

Six specimens. Near *P. sulphuriventris*, but with a large conical tubercle on the third elytral interstice below the base, as in *P. caprimulgus*; the spots on the upper surface more numerous and mostly smaller, those on the prothorax clustered into two transverse series across the middle of the disc. The elytral tubercles are more distant from the base than in *P. spretus* and conical in shape. The Guatemalan example is figured.

6. ***Piazurus succivus*.** (Tab. I. fig. 24.)

Piazurus succivus, Boh. in Schönh. Gen. Curc. iv. p. 670¹.

Piazurus notabilis, Boh. op. cit. viii. 2, p. 453².

Piazurus guttatus, Chevr. in litt.³.

Hab. MEXICO¹ (*ex coll. Sturm; Mus. Brit.*), Misantla, Cerro de Plumas (*Höge*), Toxpan, Juquila, Yolotepec, Oaxaca, Chiapas (*Sallé*), Omilteme and Amula in Guerrero (*H. H. Smith*), Villa Alta in Oaxaca (*Sommer*²); GUATEMALA, Capetillo, Purula, San Gerónimo, Cerro Zunil (*Champion*).

This species (the worn type of which I have seen) is so closely related to *P. maculipes* that it can only be separated therefrom by the sparser and more uniformly distributed vestiture of the under surface (in *P. maculipes* the sides of the abdomen are densely squamose and a broad space down the middle is almost bare), with coarser whitish scales intermixed. The following forms may be noted:—

α. The upper and under surfaces with intermixed scattered whitish scales. (Fig. 24.)

Piazurus succivus and *notabilis*, Boh.

Mexico (Vera Cruz, Guerrero, and Oaxaca) and Guatemala (Atlantic and Pacific slopes).

β. The under surface only with scattered intermixed whitish scales.

Mexico (Guerrero and Oaxaca) and Guatemala (Atlantic and Pacific slopes).

γ. The vestiture of the upper surface darker, brown and black, the upper and under surfaces with scattered whitish scales; the eyes less approximate, the median carina of the rostrum sometimes extending upwards between them.

Cryptorhynchus bufo, Sturm, in litt.

Mexico (Chiapas, Oaxaca). Four specimens.

δ. The vestiture of the upper surface paler, brown and cinereous, the black markings wanting, the under surface with scattered intermixed whitish scales; the eyes as in γ.

Mexico (Amula and Misantla). Three specimens.

The forms α and β have been found in several localities with *P. maculipes*, of which they are little more than extreme varieties. It is, however, convenient to retain *P. succivus* as distinct, as it does not appear to extend south of Guatemala. Some specimens have the head carinate between the eyes and the latter well separated. The smaller ones have the prothorax strongly transverse, and the posterior femora not nearly reaching the apex of the abdomen. The size is very variable, one example before me measuring $7\frac{1}{2}$ mm. only in length, while our largest reaches $13\frac{3}{4}$ mm. Two from Purula are infested with Acari.

7. *Piazurus maculipes*. (Tab. I. figg. 25, 25 *a*; 26, 27, 28, 28 *a*, vars.)

Piazurus maculipes, Gyll. in Schönh. Gen. Curc. iv. p. 660¹.

Piazurus saginatus, Boh. loc. cit. p. 661².

Piazurus guttularius, Chevr. in litt.³.

Hab. MEXICO^{1 2} (*ex coll. Sturm, Flohr*), Toxpam, Orizaba, San Andres Tuxtla, Yolotepec, Juquila (*Sallé*), Teapa (*H. H. Smith*), Cerro de Plumas, Misantla, Jalapa, Tapachula (*Höge*); GUATEMALA, Panzos, Telemán, La Tinta, Lanquin, and San Gerónimo in Vera Paz, El Tumbador, El Reposo, Cerro Zunil, San Isidro, Panajachel, Volcan de Atitlan, Mirandilla, Pantaleon, Zapote, Capetillo (*Champion*); NICARAGUA, Chontales (*Belt, Janson, Richardson*); COSTA RICA, Azahar de Cartago, Pozo Azul (*Underwood*), Rio Sucio (*Rogers*), Talamanca (*Biolley*); PANAMA, Bugaba, Volcan de Chiriqui, David (*Champion*).—COLOMBIA, &c.

A very variable and abundant insect, the extreme varieties of which are all more or less connected in the long series before me. The following are the leading forms:—

- α*. The prothorax and elytra mottled with fulvous, cinereous, and black, the two prominences on the third elytral interstice black and conspicuous, the elytra usually with a small spot in front of the median prominence, another at the sides, and one at the apex of the fifth interstice, cinereous or whitish, the apices emarginate. (Fig. 25.)

Mexico to Panama. The prevailing form in Mexico and Guatemala.

- β*. The prothorax fulvous, lineate with black, and with a sharply-defined, oblique, interrupted, ochreous line on each side of the disc; the elytra coloured as in *α*, the basal prominences large, the apices sharp. (Fig. 26.)
? *Piazurus bispinosus*, Gyll. loc. cit. p. 654⁴.

Costa Rica (Rio Sucio and Azahar de Cartago); two specimens. Colombia (Antioquia⁴).

- γ*. The prothorax and elytra mottled with fulvous and black, the elytra with conspicuous white spots (the anterior four arranged in an arcuate series across the middle), the basal prominences inconspicuous, the striæ finely punctate, the interstices almost flat, the apices obtuse; the mesosternal cavity very shallow behind. (Fig. 27.)

Nicaragua (Chontales). Four specimens.

- δ*. The prothorax and elytra mottled with fulvous and black, the white spots on the latter sometimes wanting; the elytra comparatively short, the interstices almost flat, the basal prominences well-developed, the apices obtuse.

Nicaragua (Chontales) and Panama (Bugaba). Twelve specimens.

- ε*. The basal prominences of the elytra wanting, the apices emarginate; the vestiture as in *α*. (Fig. 28.)

Nicaragua to Panama. The commonest form in Chiriqui.

The chief characters of *P. maculipes* are the feebly sinuate base of the prothorax and elytra, and the almost bare, sparsely punctate space down the middle of the body beneath. The two prominences on the third elytral interstice are often inconspicuous or wanting, and when this is the case the third and fourth striæ are less sinuous; the seriate punctures are sometimes coarse and the interstices more or less convex; and the apex is sometimes truncate (*P. saginatus*) or sharply dentate (? *P. bispinosus*, Gyll.). The third joint of the funiculus varies in length. The 250 examples examined (about 100 of which belong to the var. *ε*) range from $6\frac{1}{2}$ –12 mm. in length, and $3\frac{1}{3}$ – $6\frac{2}{3}$ mm. in breadth.

8. *Piazurus ciliatus*.

Pæcilma ciliatum, Germ. Ins. Spec. Nov. p. 254¹.

Piazurus bidentatus, Gyll. in Schönh. Gen. Curc. iv. p. 655²; viii. 2, p. 110³; Heller, Stett. ent. Zeit. 1906, p. 33⁴.

Hab. MEXICO (*ex coll. Sturm*).—BRAZIL^{1 2 3}.

A single worn specimen (♀) in Sallé's Mexican collection (labelled *P. maculipes*, Chevr., but not agreeing with Gyllenhal's type of that insect) seems to be referable to this species. It is closely allied to *P. maculipes*, but has the prothorax and elytra more deeply sinuate at the base, and the third elytral interstice with a very large oblong tubercle near the anterior margin. The ventral segments have a broad, smoother, almost bare space down the middle; the first segment is deeply sulcate. The Mexican habitat requires confirmation.

9. *Piazurus pallidicinctus*, sp. n. (Tab. I. fig. 29.)

Subelliptic, black, the antennæ and the tips of the tarsi obscure ferruginous; the head, the prothorax with the sides rather broadly, and four minute spots on its disc, the scutellum, the elytra with an irregular transverse post-median fascia, a transverse humeral patch, and various small scattered spots, the entire under surface (a broad space down the middle excepted), and legs, cinereous or fulvo-cinereous, the elytra also with a common, transverse, dense, velvety-black patch at the middle, the rest of the vestiture of the upper surface blackish-brown. Head densely, minutely punctate, the eyes subcontiguous; rostrum densely punctate and carinate at the base, and smooth thence to the tip; joint 2 of the funiculus nearly one-half longer than 3. Prothorax transverse, subconical; densely, minutely punctate. Elytra very much wider than the prothorax, rounded-triangular, transversely depressed below the base, the humeri swollen, the apices rather sharp, obliquely truncate; punctate-striate, the third and fourth striae sinuous, the seriate punctures rather coarse on the basal half, the interstices densely, minutely punctate, flat on the disc, 3 slightly widened at the middle. Beneath closely punctate, smoother down the middle; ventral segment 1 broadly sulcate, 5 sinuato-truncate, and also feebly foveate, at the apex.

Length $9\frac{1}{2}$ – $10\frac{1}{2}$, breadth 5 – $5\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Four specimens. The cinereous fascia of the elytra, preceded by a transverse velvety-black patch, and the cinereous sides of the prothorax, readily distinguish *P. pallidicinctus*. There are no tubercles on the elytra; the third interstice, however, is widened at the middle.

10. *Piazurus sulphuriventris*. (Tab. I. fig. 30.)

Piazurus sulphuriventris, Heller, Stett. ent. Zeit. 1906, pp. 34, 39¹.

Hab. NICARAGUA (*Sallé*¹), Chontales (*Belt, Janson*); COSTA RICA, San José (*Mus. Dresden*); PANAMA, Volcan de Chiriqui (*Champion*).

Twelve specimens, agreeing with the type communicated by Dr. Heller. This insect is very like *P. stellaris*, Pasc., from Sarayacu; but differs from it in having the elytra flattened on the disc (the third interstice neither swollen nor widened at the base and

middle), with the striæ finely punctate from the base, and the vestiture of the flanks of the prothorax dense and uniform. The prothorax and elytra have several scattered sulphur-yellow spots (six or eight on each elytron being usually larger than the rest), and the entire flanks and under surface (a broad almost smooth space down the middle excepted) are similarly coloured. The first ventral segment is broadly sulcate down the middle in both sexes, and the fifth is sinuato-truncate at the apex in the male.

11. *Piazurus stigmaticus*, sp. n. (Tab. I. figg. 31.)

Subovate, broad, dull above, black, the antennæ and the tips of the tarsi ferruginous; the upper surface variegated with minute fulvous, dark brown, and whitish scales, the whitish scales on the prothorax condensed into a narrow sinuous submarginal line, which extends on to the humeri, the fulvous scales condensed into interrupted lines on the elytra, the flanks of the prothorax in great part black; the elytra with a very large, common, transverse patch at about the middle, extending for a short distance up the suture, a small triangular lateral patch in a line with it, an oblique mark on each side of the scutellum, a small spot exterior to it, and another spot near the apex, velvety-black; the vestiture of the under surface and legs fulvous and white intermixed, rather sparse, the fulvous scales clustered into patches at the sides of the ventral segments 2-4, the femora fusco-annulate. Head densely punctate, carinate between the narrowly-separated eyes; rostrum densely punctate and sharply carinate at the base and sparsely punctate thence to the tip, the apical half smoother in the ♀; joints 2 and 3 of the funiculus equal in length, 3-7 transverse. Prothorax transverse, subconical, slightly constricted in front; densely, finely punctate and obsoletely carinate. Elytra short and broad, rounded-triangular, flattened on the disc anteriorly, conjointly rounded at the apex; punctate-striate, the interstices densely, minutely punctate, the outer ones feebly convex. Beneath closely punctate; ventral segments 1 and 2 slightly depressed down the middle, 5 subtruncate at the apex in the ♂, and rounded at the tip and plicate along the centre in the ♀. Length $6\frac{1}{2}$ -8, breadth $3\frac{2}{3}$ - $4\frac{2}{3}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Janson*); COSTA RICA, Turrialba 500 metres (*Biolley*); PANAMA, Bugaba (*Champion*).

Eight specimens. A species with comparatively short, broad elytra, which are conjointly rounded at the apex, and ornamented with sharply-defined, dense, velvety-black patches, the one crossing the suture at about the middle very large and rounded externally. The white submarginal line on the prothorax is evanescent. The black patch at the sides of the elytra sometimes extends upwards to the shoulder.

12. *Piazurus melanostictus*. (Tab. II. fig. 2.)

Piazurus melanostictus, Boh. in Schönh. Gen. Curc. iv. p. 665¹.

Hab. NICARAGUA, Chontales (*Belt*, *Janson*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—SOUTH AMERICA, Cayenne¹.

Found in numbers in Chiriqui. This species may be known by its conical, more or less distinctly carinate prothorax, and the subtriangular, depressed elytra, which are rounded at the apex and have each an oblong velvety-black patch near the suture at about the middle, the patch preceded and followed by a small white spot and sometimes coalescent with that on the opposite elytron. The second joint of the funiculus is about one-half longer than the third.

13. **Piazurus alternans.** (Tab. II. figg. 3, 3 a, ♂.)

Piazurus alternans, Kirsch, Berl. ent. Zeitschr. 1875, p. 201¹; Heller, Stett. ent. Zeit. 1906, p. 34².

Hab. NICARAGUA, Chontales (*Janson*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—BRAZIL (*coll. Fry*); PERU¹.

A common insect in Chiriqui, and varying greatly in size (length 3–6½ mm.). Dr. Heller has been kind enough to compare one of our specimens with the Peruvian type in the Dresden Museum. *P. alternans* may be known by its subovate form and the convex, fulvo-tessellate alternate elytral interstices, the third swollen below the base. The eyes are narrowly separated; the second joint of the funiculus is about twice as long as the third; the ventral segments are alutaceous, the second excavate down the middle in the male, and the first suture is strongly sinuate. Two examples have a pale patch on each side of the prothorax at the base.

14. **Piazurus condyliatus.** (Tab. II. figg. 4, 4 a.)

Piazurus condyliatus, Boh. in Schönh. Gen. Curc. iv. p. 678¹.

Piazurus (*Pseudopinarus* *) *condyliatus*, Heller, Stett. ent. Zeit. 1906, p. 34².

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*), Cerro de Plumas (*Höge*); GUATEMALA, Chacoj and Tamahu in Vera Paz (*Champion*); PANAMA, Bugaba, Volcan de Chiriqui, Caldera (*Champion*).

A common insect in Chiriqui. Recognizable by its small size (length 5–6⅔ mm.), the very elongate second joint of the funiculus, the setigerous granules on the elytra, and the two swollen oblong prominences on the third interstice. The head has a circular flattened space on the vertex. The sides of the prothorax are parallel at the base. The ventral surface is densely punctate and squamose, and the first segment is unimpressed.

15. **Piazurus rana.** (Tab. II. figg. 5, 5 a.)

Piazurus (*Pseudopinarus* *) *rana*, Heller, Stett. ent. Zeit. 1906, pp. 34, 41¹.

Hab. MEXICO (*ex coll. Flohr*), Toxpam in Vera Cruz (*Sallé*); COSTA RICA, San Carlos (*Mus. Dresden* ¹).

The type of this species has been communicated by Dr. Heller, and we have four specimens from Mexico agreeing with it. *P. rana* is very like *P. condyliatus*, but larger; the second joint of the funiculus is nearly three times as long as the third; the prothorax has a large, compressed prominence on the middle of the disc and a small tubercle on each side in a line with it; the elytra are subquadrate, and the second oblong prominence on the third interstice is wanting. The first ventral

* In Dr. Heller's table the names *Pseudopiazurus* and *Pseudopinarus* are transposed on p. 34.

segment has a shallow arcuate groove between the coxæ; the fifth segment is sinuato-truncate at the apex in the male.

16. *Piazurus quadratus*, sp. n. (Tab. II. figg. 6, 6 *a*, *b*, ♂.)

Broad, depressed, shining, black, the antennæ and the tips of the tarsi obscure ferruginous; sparsely clothed with narrow brownish and cinereous scales, the elytral tubercles each bearing a short, decumbent, pallid seta. Head rugosely punctate, the vertex granulate in front, depressed in the middle, the eyes contiguous; rostrum slightly widened towards the tip, lineato-punctate at the base, and very sparsely, finely punctate thence to the apex; joints 2 and 3 of the funiculus equal in length. Prothorax short, about one-half broader than long, abruptly narrowed and compressed at the sides anteriorly, the sides parallel from the middle to the base, the base itself deeply bisinuate; rather coarsely, irregularly punctate. Elytra about one-half wider than the prothorax, subparallel in their basal third, conjointly rounded at the apex, the disc strongly, transversely depressed below the base; coarsely punctate-striate, the punctures becoming smaller and oblong in shape on the apical declivity, the interstices (except on the apical portion of the disc) set with numerous small, smooth, conical, setigerous tubercles, 3 with a stout, oblong prominence at the middle and a small prominence below the base, and 5, 7, and 9 more or less raised. Ventral segments very sparsely punctate, 1 plicato on each side in a line with the inner edge of the posterior coxa, 2 along the middle nearly as long as 3-5 united, 5 with a rounded depression in the centre, which is limited in front by an arcuate ridge, the first suture strongly arcuate. Pygidium narrowly exposed. Legs rather short; anterior femora unarmed, intermediate femora with a small tooth, posterior femora very broadly clavate and armed with a large triangular tooth; posterior tibiæ broad, curved, mucronate at the inner apical angle.

Length 8, breadth $4\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. A peculiar form, easily recognizable by the very short, abruptly narrowed prothorax, the broad, subquadrate, transversely excavate, granulate elytra, and the greatly developed posterior femora. *P. quadratus* has the first ventral segment arcuato-sulcate, as in *P. centrali-americanus*, but the species seems to belong to Heller's subgenus *Pseudopinarus*. It has the mesosternum less transverse than in the genus *Pinarus*.

17. *Piazurus centrali-americanus*. (Tab. II. figg. 7; 7 *a*, hind leg.)

Piazurus (Pseudopiazurus) centrali-americanus, Heller, Stett. ent. Zeit. 1906, pp. 32, 34, 40¹.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); GUATEMALA, Las Mercedes, Cerro Zunil, Mirandilla (*Champion*); NICARAGUA, Chontales (*Janson*); COSTA RICA, San Carlos (*Mus. Dresden*¹); PANAMA, Bugaba (*Champion*), Chiriqui (*Trötsch*).—ECUADOR (*Buckley, in coll. Fry*).

Thirteen specimens, agreeing with the Costa Rican type communicated by Dr. Heller. A large, robust form, with contiguous eyes, a narrow, conical prothorax, impressed with intermixed coarse and minute punctures, and broad, coarsely seriate-punctate elytra, the interstices of which are narrow, convex, and seriato-granulate. The anterior and intermediate femora are unarmed, the posterior pair with a large triangular tooth. The pygidium is rather broadly exposed. The first ventral segment is longitudinally

plicate in a line with the inner edge of each posterior coxa, the two ridges forming the outer limits of a $\cap$ -shaped groove; the fifth segment is shallowly arcuate-emarginate in the male. In the allied *P. obesus*, Boh., the sharp tooth on the inner edge of the posterior tibiæ is wanting.

PELTOPHORUS.

*Peltophorus**, Schönherr, Gen. Curc. viii. 2, p. 451 (1845); Lacordaire, Gen. Col. vii. p. 151; Heller, Abhandl. Mus. Dresden, no. 11, pp. 3, 18 (1895).

Zygops, Leconte and Horn, Class. Col. N. Am. 2nd edit. p. 489 (1883); Casey, Ann. N. York Acad. Sci. ix. p. 667 (1897).

Apatorhynchus, Desbrochers, Ann. Soc. Ent. Belg. xxxv. pp. 37, 40 (1891).

A genus peculiar to Mexico, Texas, and Arizona. In addition to the characters given by Lacordaire to separate it from *Zygops* (the relatively longer basal joint of the funiculus, the excavate mesosternum, &c.), it may be noted that the rostral canal is much deeper, the anterior coxæ are more widely separated, and the intermediate and posterior tibiæ are strongly ciliate on their outer edge from about the middle to the apex. The males have a broad, oval or pyriform, depression extending down the middle of the ventral surface. *P. polymitus*, like *Cratosomus punctulatus*, is a very variable insect. In both species the alternate elytral interstices 3, 5, 7, and 9 are raised and seriato-granulate.

1. *Peltophorus polymitus*. (Tab. II. figg. 8; 8 a, hind leg; 9, 9 a, var.)

Peltophorus polymitus, Boh. in Schönh. Gen. Curc. viii. 2, p. 452¹.

Peltophorus leucomelas, Lacord. Gen. Col. vii. p. 152, nota (sine descr.)².

Zygops seminiveus, Lcc. Trans. Ent. Soc. xii. p. 31 (1885)³; Lec. and Horn, Class. Col. N. Am. 2nd edit. p. 489⁴; Casey, Ann. N. York Acad. Sci. vi. pp. 459, 460⁵.

Zygops suffusus, Casey, loc. cit.⁶.

Hab. NORTH AMERICA, Pinal Mts. (*Wickham*), Arizona^{3 4}, Texas⁶.—MEXICO^{2 7} (*ex coll. Flohr*), Northern Sonora (*Morrison*), Ventanas in Durango, Esperanza (*Höge*), Puebla (*Sallé*), Jalapa (*Ferrari-Perez*), Tehuantepec (*coll. Fry*), Villa Alta in Oaxaca¹.

Var. *leopardinus*.

♂. *Zygops* (*Apatorhynchus*) *leopardinus*, Desbr. Ann. Soc. Ent. Belg. xxxv. p. 40⁷.

The prothorax with four or five spots on the disc, which are often more or less confluent, two on each side, and one or two others on the flanks, black. (Fig. 9.)

Hab. MEXICO⁷, Matamoros Izucar, Cuernavaca, Huitzilac (*Höge*), Guerrero (*Baron*), Juquila (*Sallé*).

The two forms of this insect are about equally common in Mexico, but only one of them, the true *P. polymitus*, extends northward into the Southern United States. The white, yellowish, or fulvous markings are very variable in extent (often asymmetric on the elytra, or condensed on the disc into short, oblique, or transverse streaks), both on

* The name *Peltophora* was used by Burmeister in 1835 for a genus of Hemiptera.

the upper and under surfaces, and on the pygidium and legs. The males have a very large, pilose, pyriform depression on the abdomen beneath, extending from the base to the apex, the corresponding space being simply flattened and squamose in the female. Leconte and Horn⁴ suspected that *Z. seminiveus* was identical with a Mexican species. I have seen Desbrochers's type of *Z. leopardinus*.

2. *Peltophorus jordani*. (Tab. II. figg. 10, 10 a.)

Peltophorus jordani, Heller, Abhandl. Mus. Dresd. no. 11, p. 18¹.

Hab. MEXICO (*Mus. Brit.*), Cuernavaca (*Mus. Dresden*¹, *Sallé*), Parada (*Sallé*).

This insect differs from *P. polymitus* in having the disc of the prothorax separated from the flanks by a distinct sinuous ridge, and the disc itself immaculate between the sharply-defined brownish-white marginal stripe; the elytra are slightly mottled with light and dark scales, and have a short pallid streak along the suture below the base. The rostrum is closely punctate to the apex in the male, the apical portion being smoother in the female. The ventral depression of the male is much shallower than in the same sex of *P. polymitus* and does not extend beyond the second segment; the hairs, too, are wanting.

ZYGOPS.

Zygops, Schönherr, Curc. Disp. Meth. p. 300 (1826); Gen. Curc. iv. p. 601; Lacordaire, Gen. Col. vii. p. 150; Desbrochers, Ann. Soc. Ent. Belg. xxxv. p. 37 (1891); Heller, Abhandl. Mus. Dresden, no. 11, pp. 3, 17 (nec Leconte and Casey).

A Tropical-American genus including about fifty described species and well represented within our limits. It is chiefly recognizable by the completely exposed pygidium, the moderately long rostrum, and the flattened mesosternum. The identification of some of the smaller forms is, unfortunately, impossible from the descriptions alone, often based upon insufficient material, and even in Desbrochers's various papers on *Zygops* the sexual characters are not recognized as such or ignored. The males have the first two ventral segments more or less depressed down the middle, the depression on the second segment sometimes pilose, and the anterior tarsi in a few cases (*Z. vitticollis* and *Z. mexicana*) hairy, as in certain Cryptorrhynchids.

- a. Posterior femora extending far beyond the apex of the abdomen, longer than the elytra, bidentate; posterior tibiæ sharply mucronate at the inner apical angle; prothorax feebly bisinuate at the base; neck and pygidium carmine-red *rufitorquis*, sp. n.
- b. Posterior femora less elongate, extending beyond the apex of the abdomen, but shorter than the elytra.
 - a¹. Posterior knees with the outer lobe angularly produced; posterior femora bi- or tri-dentate; prothorax subtruncate at the base, sharply trivittate; body elongate *vitticollis*, Desbr.

- b*¹. Posterior knees with the outer lobe not longer than the inner ;
prothorax strongly bisinuate at the base.
- a*². Prothorax with a large red patch on each side in front; posterior
femora not annulate.
- a*³. Posterior femora bidentate; eyes well-separated; prothorax
nigro-bivittate and nigro-fasciate; pygidium black . . . *rufomaculata*, sp. n.
- b*³. Posterior femora unidentate; eyes subcontiguous; prothorax
with a dark patch on the disc; pygidium red . . . *erythropygæ*, sp. n.
- b*³. Prothorax without red markings; posterior femora sharply
nigro-annulate.
- c*³. Posterior femora bidentate; posterior tibiæ feebly mucronate
at the inner apical angle.
- a*⁴. Prothorax with an anchor-shaped blackish patch on the
disc, the sides albo-maculate posteriorly; elytra varie-
gate . . . *mexicana*, Boh.
- b*⁴. Prothorax with a rounded or subquadrate dark patch on
the disc, the sides obliquely streaked with white pos-
teriorly; elytra with a black patch, preceded and followed
by a white spot . . . *histrion*, Boh.
- d*⁴. Posterior femora unidentate; posterior tibiæ flavo-annulate,
sharply mucronate at the inner apical angle; prothorax with
a subtriangular dark patch on the disc, nigro-maculate on
the flanks; elytra variegate . . . *maculiventris*, sp. n.
- c*. Posterior femora shorter, not or about reaching the apex of the
abdomen.
- c*¹. Posterior knees with the outer lobe broadly produced; pos-
terior femora 4- or 5-dentate; body subelliptic: length over
9 mm. . . *quadridentata*, sp. n.
- d*¹. Posterior knees with the outer lobe not longer than the inner;
body oblong or oblong-ovate: length $3\frac{1}{2}$ – $7\frac{1}{2}$ mm.
- c*³. Posterior femora 3- or 4-, the other femora 2-, dentate.
- e*³. Elytra with large fulvous, white-edged spots, the prothorax
with a transverse, arcuate, black fascia; the vestiture of the
under surface almost wholly white . . . *amænula*, sp. n.
- f*³. Elytra variegate, the prothorax not transversely fasciate; the
vestiture of the under surface more or less mottled at the
sides.
- c*⁴. Prothorax and elytra blackish, sprinkled with white . . . *dissecta*, sp. n.
- d*⁴. Prothorax and elytra variegate; posterior femora fuscous
at the middle.
- a*⁵. Prothorax interruptedly trivittate; joint 3 of the funi-
culus as long as 4–7 united . . . *sellata*, sp. n.
- b*⁴. Prothorax spotted; joint 3 of the funiculus much shorter
than 4–7 united . . . *tridentata*, Gyll.

- d*². All the femora bidentate ; prothorax trivittate, the elytra variegated ; under surface spotted with brown along the sides, the scales narrow ; posterior femora fusco-annulate near the middle. *maculipes*, Desbr.
- e*³. Posterior femora bi-, the other femora uni-, dentate ; posterior femora fusco-maculate at the apex above.
- g*³. Vestiture coarse, variegated above, white beneath, a blackish spot on the metathoracic episterna excepted ; outer tooth of posterior femora narrow, minute, and arising from the larger one. *cataleuca*, sp. n.
- h*³. Vestiture much finer, that of the under surface wholly white ; outer tooth of posterior femora small, triangular, separated from the larger one.
- e*⁴. Prothorax trivittate ; elytra variegated. *trivittata*, sp. n.
- f*⁴. Prothorax interruptedly trivittate ; elytra with a spot on each side of the scutellum at the base, and another near the middle of the suture, black *sobrina*, Gyll.

1. *Zygops rufitorquis*, sp. n. (Tab. II. figg. 11, 11 *a*, ♀.)

Elongate-ovate, narrow, concave above, black, the antennæ and the dorsal portion of the femora obscure ferruginous, the vestiture close and fine ; the head (the narrow intraocular space and the base of the rostrum excepted, which are white), a band round the apex of the prothorax, and the pygidium carmine-red, the prothorax also encircled across the middle by a narrow white and a broader black band, the latter sending off two branches to the base, the intervening spaces cinereous ; the elytra with three transverse black fasciæ—one below the base, one beyond the middle, and one near the apex, the second extending obliquely forwards near the suture,—and for the rest clothed with cinereous and fulvous scales ; the under surface white, the sides of the meso- and metasternum maculated with fulvous and black, the abdomen with two transverse black fasciæ on each side—one at about the middle and the other close to the apex ; the legs cinereous, the dorsal surface of the femora partly fulvous. Eyes narrowly separated ; rostrum rather stout, moderately long, arcuate, broadly bisulcate and uniearinate at the base ; joint 2 of the funiculus one-half longer than 3. Prothorax transverse, gradually narrowing forwards and slightly narrowed at the base, the base itself feebly bisinuate ; densely, minutely punctate. Elytra oblong, not wider than the prothorax, obtuse at the apex, hollowed on the disc below the base ; very finely punctate-striate, the interstices densely punctulate, flat, 1 granulate towards the base and apex. Posterior legs very elongate, the others moderately long ; anterior and intermediate femora uni-, the posterior femora bi-, dentate, the outer tooth on the latter small and distant from the longer one ; posterior tibiæ curved, rather broad, very sharply mucronate at the inner apical angle in both sexes. Abdomen with the second ventral segment, and the apex of the first, depressed down the middle in the ♂.

Length 7-7½, breadth 2⅔-2⅞ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Belt*: ♀).—SOUTH AMERICA, Cayenne and Brazil (*Mus. Brit.*: ♂ ♀).

Seven specimens. In this extraordinary insect the head (except between the eyes), a band extending round the apex of the prothorax, and the pygidium are of a brilliant carmine-red colour ; the posterior femora are longer than the elytra ; and the posterior tibiæ (as in *Z. maculiventris*) are sharply mucronate at the inner apical angle *. *Z. scenica*, Gyll., is somewhat similarly coloured.

* In an unnamed closely allied Brazilian form in the British Museum the posterior tibiæ of the ♂ are broadly dilated.

2. *Zygops vitticollis*. (Tab. II. fig. 12, ♂.)

Zygops vitticollis, Desbr. Ann. Soc. Ent. Belg. xxxv. p. 39¹.

Hab. MEXICO¹ (*Mus. Brit.*), Toxpam (*Sallé*), Cerro de Plumas (*Höge*); GUATEMALA Teleman, Chacoj, and San Gerónimo in Vera Paz (*Champion*); NICARAGUA (*Sallé*), Chontales (*Belt, Janson*); PANAMA, Volcan de Chiriqui (*Champion*).

Found in plenty in the hottest parts of the Polochic Valley in Guatemala. It is easily recognizable by its elongate form, the sharply trivittate prothorax, and the fulvo-variegate elytra, the under surface whitish, spotted with fuscous along the sides. The suture of the elytra is granulate almost to the base. The male has the anterior tarsi clothed on each side with long hairs, the first and second ventral segments broadly depressed along the middle, and the fifth segment sinuato-truncate at the apex. The femora have one or two (the anterior pair sometimes with three) small teeth exterior to the larger one. The length varies from $4\frac{1}{2}$ – $9\frac{1}{2}$ mm.

3. *Zygops rufomaculata*, sp. n. (Tab. II. figg. 13, 13 a, ♀.)

Elongate-ovate, broad, flattened above, black, the vestiture close and fine; the head with an ochreous line around the eyes; the prothorax flavo-cinereous, with a very large carmine-red patch on each side in front, which extends downwards on to the flanks, and two black vittæ on the disc, these latter connected near the base with a curved, sinuous, black stripe extending around the flanks from the lower anterior margin; the elytra with the basal half black, with a short curved stripe near the suture at the base, and various spots below and exterior to it, flavo-cinereous or fulvous, the apical half alternately lineate with fuscous and cinereous; the pygidium black; the vestiture of the under surface dense, white, extensively maculated with black—a very broad oblique band on the sides of the metasternum extending forwards over the mesosternal side-pieces, an oblique stripe on each side of the abdomen, and two stripes down the segments 2–5,—that of the legs brownish or cinereous, the femora without darker annuli. Eyes well-separated; rostrum arcuate, tricarinate and deeply quadrisulcate at the base; joint 2 of the funiculus more than twice the length of 3, 4–7 submoniliform. Prothorax transverse, strongly bisinuate at the base, the sides arcuately converging anteriorly; densely, minutely punctate. Elytra slightly wider than the prothorax, somewhat rounded at the sides, separately rounded at the apex, and arcuately depressed below the base; finely punctate-striate, the striæ sinuous below the base, the alternate interstices wider than the others, convex, and sparsely seriato-granulate, 1 conspicuously granulate beyond the middle. Legs elongate; posterior femora bi-, the others uni-dentate.

Length $9\frac{1}{2}$ –13, breadth 4– $5\frac{1}{2}$ millim. (♀.)

Hab. NICARAGUA, Chontales (*Janson*).—COLOMBIA, Buenaventura (*coll. Fry*).

Three specimens. A peculiarly-marked insect, the elytra having the basal and apical halves differently coloured, the prothorax both transversely and longitudinally lineate with black, and ornamented with a large carmine-red patch on each side in front. *Z. rufomaculata* is related to *Z. mexicana*, but in colour it is more like *Z. rubricollis*, Boh.

4. *Zygops erythropyga*, sp. n. (Tab. II. figg. 14, 14 a, ♀.)

Oblong-ovate, broad, flattened above, black or piceous, the antennæ and sometimes the legs and rostrum in part, reddish, the vestiture close and fine; the head with an ochreous ring around the eyes; the

prothorax with a large, subquadrate, dark patch on the disc, the short anterior lobe and the broad depressed space on each side in front (the fulvous inner portion excepted) carmine-red, the rest of the vestiture sparse, cinereous; the scutellum and elytra variegated with cinereous and fuscous, the elytra with a broad space along the sides (extending from the middle to the apex) black, enclosing two transverse whitish spots; the pygidium carmine-red; the vestiture of the under surface dense, whitish, marked with large black spots—two on the flanks of the prothorax, one on the mesothoracic epimera, one on the sides of the metasternum (extending across the episterna), and four on the abdomen,—the sides of the last ventral segment and a patch on the metathoracic episterna carmine-red; the legs cinereous, the posterior femora with a reddish or fulvous streak on the outer face near the base. Eyes almost contiguous in front; rostrum arcuate, tricarinate and quadrisulcate at the base; joint 2 of the funiculus nearly twice as long as 3, 4-7 submoniliform. Prothorax transverse, rounded at the sides, very deeply bisinuate at the base; densely, minutely punctate. Elytra very little wider than the prothorax, obtuse at the apex, arcuately depressed below the base; finely punctate-striate, the interstices densely punctulate, 1 and 5 sparsely granulate, 1 swollen at the base. Legs elongate; femora unidentate; tibiae feebly mucronate at the inner apical angle.

Length $9\frac{1}{2}$ – $13\frac{1}{2}$, breadth 4 – $5\frac{1}{2}$ millim. (♀.)

Hab. NICARAGUA, Chontales (*Belt*).—ECUADOR, Lita (*coll. Fry*).

We have received three specimens of this species, and there are six others in the Pascoe and Fry collections at the British Museum. Near *Z. maculiventris*, but with the broad depressed space at the sides of the prothorax in front, the pygidium, and a patch on the sides of the metasternum and abdomen, carmine-red; the prothorax more strongly sinuate at the base, the elytra somewhat rounded at the sides, the femora and tibiae not annulate.

5. *Zygops mexicana*. (Tab. II. figg. 15, 15 a, ♀.)

Zygops mexicanus, Boh. in Schönh. Gen. Cure. iv. p. 611¹.

Zygops signativentris, Boh. op. cit. viii. 2, p. 89².

Hab. MEXICO (*Mus. Brit.*), Vera Cruz (*Chevrolat*¹), Toxpam, San Andres Tuxtla, Santecomapan (*Sallé*), Cerro de Plumas (*Höge*); GUATEMALA, Yzabal (*Sallé*), Panzos, Chacoj, Senahu, and San Gerónimo in Vera Paz, El Tumbador, Las Mercedes, Paraiso, San Isidro, Cerro Zunil, El Reposo, Pantaleon (*Champion*); NICARAGUA (*Sallé*), Chontales (*Belt, Janson*); COSTA RICA, Limon, San Carlos (*Biolley*); PANAMA, Bugaba, Tolé (*Champion*).—SOUTH AMERICA, Colombia, Ecuador, Cayenne², Peru.

A common insect in the "tierra caliente" of Central America, occurring on both the Atlantic and Pacific slopes, and extending southward to Peru. It may be known from most of its allies by the anchor-shaped dark patch on the disc of the prothorax, the scattered white spots on both the prothorax and elytra (two of which, subtriangular in shape, are situate near the hind angles of the former), the large, subtriangular, black patch at the sides of the elytra, the black patches on the abdomen and on the sides of the metasternum, &c. The male has the fifth ventral segment sinuate-truncate at the apex, the first and second segments depressed down the middle (the groove being shallow in the female), and the anterior tarsi clothed with a few long, fine, projecting

hairs. The posterior femora always have a short triangular tooth exterior to the long one. The length varies from 6–10 $\frac{1}{4}$ mm.

6. *Zygops histrio*. (Tab. II. fig. 16, ♂.)

Zygops histrio, Boh. in Schönh. Gen. Curc. iv. p. 612¹.

? *Zygops submaculatus*, Boh. loc. cit.².

Zygops affinis, Dej. in litt.³.

Hab. NICARAGUA, Chontales (*Belt*).—SOUTH AMERICA, Cayenne^{1 2}, Brazil¹.

Four specimens, agreeing with an example of *Z. affinis*, Dej., from Brazil, in the British Museum. They are narrower than *Z. mexicana*, and have two oblique whitish streaks near the hind angles of the prothorax; the black patch on the elytra smaller, rounded or subquadrate, and preceded and followed by a white spot; and the legs in great part ferruginous. The male-characters are similar, except that the anterior tarsi want the projecting hairs. According to Desbrochers (Ann. Soc. Ent. Belg. xxxv. p. 42), *Z. submaculata*, Boh. (*affinis*, Dej.), is a variety of the same species.

7. *Zygops maculiventris*, sp. n. (Tab. II. figg. 17, 17a, ♂.)

Oblong, rather broad, flattened above, piceous, the antennæ and tarsi obscure ferruginous, the tibiæ with a very broad flavo-testaceous annulus near the apex, the vestiture close and fine; the head with an ochreous line around the eyes; the prothorax cinereous at the sides and down the middle, becoming fulvous towards the apex, and with a large, subtriangular, anteriorly excised, fuscous patch on the posterior portion of the disc; the rest of the upper surface mottled with brownish-black and flavo-cinereous, the elytra with a sharply-defined yellowish spot at the sides beyond the middle and another in a line with it near the apex; the vestiture of the under surface dense, whitish-ochreous, sharply maculated with black—a broad, curved, irregular stripe on the flanks of the prothorax (visible as two spots from above), a small spot on the mesothoracic epimera, a large patch on the sides of the metasternum (not extending on to the episterna), and four large spots on the abdomen,—that of the legs ochreous or flavo-cinereous, the femora each with a blackish patch. Eyes very large, narrowly separated; rostrum arcuate, tricarinate and quadrisulcate at the base; joint 2 of the funiculus nearly twice as long as 3. Prothorax transverse, rounded at the sides anteriorly, strongly bisinuate at the base; densely, minutely punctate. Elytra moderately long, a little wider than the prothorax, obtuse at the apex, transversely depressed below the base; finely punctate-striate, the interstices densely punctulate, 1 and 5 sparsely granulate, 1 swollen at the base and 5 slightly raised. Ventral segments 1 and 2 depressed down the middle, the depressed space on 2 densely clothed with erect yellowish hairs. Femora each with a single sharp tooth, the posterior pair reaching beyond the apex of the abdomen. Posterior tibiæ sharply mucronate at the inner apical angle. Anterior tarsi without projecting hairs.

Length 9–12 $\frac{1}{2}$, breadth 4–5 $\frac{1}{2}$ millim. (♂.)

Hab. GUATEMALA, Cerro Zunil 4000 feet (*Champion*).

Two males. A remarkably distinct species, nearly allied to *Z. mexicana*; but differing from it in the nigro-maculate flanks of the prothorax, the subtriangular dark patch on its disc, the absence of white spots on the upper surface, the equally unidentate femora, the flavo-annulate tibiæ, &c.

8. *Zygops quadridentata*, sp. n. (Tab. II. figg. 18, ♂; 18 a, hind leg.)

Subelliptic, broad, flattened above, nigro-piceous, the antennæ obscure ferruginous; the vestiture dense and fine, fulvous-brown, the head with a line around the eyes, and the prothorax with a faint median line and a narrow, sinuous, oblique stripe on each side, whitish, the elytra with widely scattered black and whitish spots, a black excised patch near the suture at about the middle being larger than the rest, the pygidium with a whitish median line; beneath flavo-cinereous, slightly mottled with brown along the sides, the fifth ventral segment with a brown spot on each side; the legs flavo-cinereous, the posterior femora brown at the apex. Eyes narrowly separated; rostrum arcuate, rugosely punctate and feebly tricarinate at the base; joint 2 of the funiculus about one-half longer than 3. Prothorax transverse, feebly bisinuate at the base, the sides sinuate and rapidly converging from the middle forwards; densely, minutely punctate. Elytra much wider than the prothorax, transversely depressed below the base, slightly rounded at the sides, obtuse at the apex; finely punctate-striate, the interstices densely punctulate, flat, 1 granulate from the base to the apex. Ventral segments 1 and 2 broadly excavate down the middle. Legs rather short, the posterior femora extending slightly beyond the apex of the abdomen; posterior femora 4- or 5-, and the others 2-, dentate, the former with a rather long, truncated plate at the outer apical angle.

Length $9\frac{1}{2}$ -10, breadth $4\frac{1}{4}$ -5 millim. (♂.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

Two males. A rather large, broad, robust form, subelliptic in shape, with the legs comparatively short and the posterior femora armed with three or four small teeth exterior to the larger one, the outer lobe at the apex produced into a broad truncated plate. The elytra are marked somewhat as in *Z. trivittata*. Various nearly allied species occur in South America, but they want the long lamella at the apex of the posterior femora.

9. *Zygops amœnula*, sp. n. (Tab. II. figg. 19, 19 a, ♀.)

Zygops amœnula, Jekel, in litt.

Elongate-ovate, rather convex, black, the antennæ ferruginous at the base; densely clothed with small scales: the head with a Λ -shaped fulvous or white mark between the eyes, the prothorax with a broad, transverse, arcuate fascia on the basal portion of the disc, and a broad oblique stripe behind the eyes, black, the intervening space fulvous, the outer and inner basal portions and the scutellum white, the elytra black, each with four or five fulvous, white-edged spots (the three larger ones placed in an irregular longitudinal series on the disc, the posterior one curved, the others small and exterior to the first), the pygidium black, white at the sides and along the middle; the vestiture of the under surface very dense, white, the mesothoracic episterna in part, a space between the middle and posterior coxæ, and the sides of the first ventral segment, black; the anterior and intermediate femora, and a patch on the hind pair above, white, the rest of the vestiture of the legs in great part black. Eyes very large, almost contiguous in front; rostrum strongly arcuate, moderately long, unicarinate and rugulose at the base; joints 2 and 3 of the funiculus elongate, 2 twice the length of 3. Prothorax transverse, subquadrate, narrowed in front, very feebly bisinuate at the base; densely, minutely punctate. Elytra oblong, slightly wider than the prothorax, truncate at the base and obtuse at the apex; finely and shallowly punctate-striate, the interstices densely punctulate, flat, 1 feebly granulate. Legs rather short; posterior femora tri-, the others bi-, dentate, the posterior pair about reaching the apex of the abdomen.

Length $6\frac{1}{5}$ - $6\frac{2}{3}$, breadth $2\frac{1}{2}$ millim. (♀?)

Hab. NICARAGUA, Chontales (*Belt*).—SOUTH AMERICA, Rio Janeiro, Pará (*Mus. Brit.*).

Three specimens of this species have been received from Chontales. The elongate shape, the black elytra, ornamented with large, fulvous, white-edged spots, the curved,

transverse, black fascia on the disc of the prothorax at the base, the dense pure white vestiture of the greater part of the under surface, the tridentate posterior femora, and the long third joint to the funiculus, readily distinguish *Z. amœnula*. Some of the South-American examples have the black fascia on the prothorax divided down the middle, the basal spots on the elytra white and the others angulate, &c.

10. *Zygops disjecta*, sp. n. (Tab. II. fig. 20.)

Oblong-ovate, nigro-piceous or black, variegated above and beneath with small scattered white scales, which become more crowded along the middle of the body beneath, the rest of the vestiture uniformly fuscous. Eyes very large, almost contiguous in front; rostrum arcuate, rather elongate, rugosely punctate and shallowly quadrisulcate at the base, and smooth thence to the tip; antennæ with joint 2 of the funiculus very elongate, nearly twice the length of 3, the latter rather longer than 4-7 united, the club oblong-ovate. Prothorax transverse, narrowed in front, feebly bisinuate at the base; densely, finely punctate. Elytra considerably wider than the prothorax, comparatively short, broadly truncate at the apex; finely punctate-striate, the interstices flat, densely punctulate, 1 obsoletely granulate. Legs rather short and stout; posterior femora tri-, the others bi-, dentate, the outer teeth on the posterior pair very short.

Length $6\frac{1}{5}$ – $7\frac{1}{5}$, breadth 3 – $3\frac{1}{4}$ millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).—BRAZIL, Espirito Santo (*coll. Fry*).

Three specimens, the one from Chiriqui with the vestiture slightly abraded on the prothorax and legs. The long third joint of the funiculus, the oblong-ovate antennal club, the comparatively short, broad, truncated elytra, and the scattered white scales, separate *Z. disjecta* from its allies. The outer teeth of the posterior femora are shorter than in *Z. tridentata* and *Z. sellata*.

11. *Zygops sellata*, sp. n. (Tab. II. figg. 21, 21 a, ♀.)

Zygops sellatus, Dej. in litt.

Oblong-ovate, rather broad, nigro-piceous, the antennæ obscure ferruginous; variegated above with small fulvous (or pale ochreous) and blackish scales, the fulvous scales on the prothorax mostly clustered along the sides, in front of the scutellum, and down the centre, the blackish scales on the elytra more or less condensed into a common transverse patch before the middle; the under surface and legs with intermixed fulvous, cinereous, and brown scales, becoming paler down the centre, the posterior femora fusco-annulate at about the middle. Eyes very large, almost contiguous in front; rostrum moderately long, arcuate, rugosely punctate and feebly tricarinate at the base; joint 2 of the funiculus nearly twice the length of 3, 3 as long as 4-7 united. Prothorax transverse, narrowed in front, feebly bisinuate at the base, the sides parallel behind; densely punctate. Elytra considerably wider than the prothorax, rather short, sub-truncate at the apex; finely punctate-striate, the interstices flat, densely punctulate, 1 finely granulate throughout, and 3 with a few minute scattered granules. Legs rather short and stout; posterior femora tri- or quadri-, the others bi-, dentate.

Length $4\frac{1}{2}$ – $6\frac{1}{2}$, breadth 2 – $3\frac{1}{10}$ millim. (♀.)

Hab. GUATEMALA, Senahu (*Champion*); NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba (*Champion*).—SOUTH AMERICA, Cayenne, Brazil.

Four specimens. Very like *Z. tridentata*, but with a relatively longer third joint to the funiculus (fig. 21 a), and the fulvous or ochreous scales on the prothorax mostly condensed along the sides and down the middle, the elytra sometimes with a large,

common, transverse, subquadrate dark patch on the disc. This insect seems to be a form of the *Z. sellatus* of Dejean, which, according to Desbrochers, is synonymous with *Z. scutulata*, Er., with the description of which it does not agree. The male of the Brazilian *Z. sellata* has the first ventral segment shallowly depressed and not pilose.

12. *Zygops tridentata*. (*Z. impressiventris*, Tab. II. figg. 22, 22 a, ♀ ; 22 b, hind leg.)

♀. *Zygops tridentatus*, Gyll. in Schönh. Gen. Curc. iv. p. 621¹.

♂. *Zygops impressiventris*, Desbr. Ann. Soc. Ent. Belg. xxxv. p. 40².

Var. *Zygops semialbus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 28³.

Very like *Z. sellata* but with the prothorax sprinkled with white scales, the fulvous scales condensed into various more or less confluent spots, both on the disc and at the sides, the elytra mottled with purplish-brown, cinereous, and black scales, the under surface also mottled at the sides, cinereous down the middle; the third joint of the funiculus much shorter, about as long as the next two or three joints united; the prothorax sinuate at the sides, the ante-apical groove deep; the sutural interstices of the elytra granulate throughout and a little raised; the ventral segments 1 and 2 broadly depressed down the middle, and the depression on 2 thickly clothed with long, fine, erect brownish hairs, in the ♂; the legs short and stout, the posterior femora tri- or quadri-, the others bi-, dentate.

Length $4\frac{1}{2}$ –7, breadth 2 – $3\frac{1}{3}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*), Toxpan (*Sallé*); GUATEMALA (*Mus. Brit.*), Teleman, Chacoj, and San Gerónimo in Vera Paz, El Reposo, Las Mercedes, San Isidro, Cerro Zunil, Volcan de Atitlan (*Champion*), Panzos, Coban (*Conradt*); NICARAGUA, Chontales (*Belt*); COSTA RICA (*Sallé*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—SOUTH AMERICA, Colombia, Cayenne^{1 2 3}.

Many specimens, varying greatly in size, about half of them from the Pacific slope of Guatemala. The cluster of erect hairs on the depressed portion of the second ventral segment of the male is a peculiar character, separating *Z. tridentata* from most of the other short-legged Central-American forms. I have seen the types of *Z. tridentatus*, *Z. impressiventris*, and *Z. semialbus*, and am unable to separate them, the long series before me connecting the various forms. The markings on the prothorax vary in extent, and the elytra are sometimes dark.

13. *Zygops maculipes*. (Tab. II. figg. 23, ♀ ; 23 a, hind leg.)

♀. *Zygops maculipes*, Desbr. Ann. Soc. Ent. Belg. xxxv. p. 40¹.

Oblong, piceous, the antennæ, the apex of the rostrum, and the tarsi more or less ferruginous; variegated above with small purplish-brown and cinereous scales, the latter condensed into three vittæ on the prothorax (the central one narrow, the others broad and often interrupted) and various small scattered patches on the elytra, the elytra also more or less maculated with black, or with a blackish patch on the middle of the disc near the suture; the under surface clothed with small, narrow, cinereous or flavo-cinereous scales, spotted with brown along the sides, the legs cinereous, the posterior femora sharply, and the others less distinctly, fusco-annulate at about the middle. Eyes very large, almost contiguous in front; rostrum moderately long, rugulose and feebly carinate at the base; joints 2 and 3 of the funiculus slender, elongate, 3 one-half the length of 2 and about as long as 4–7 united. Prothorax transverse, narrowed in front, the sides parallel at the base, the latter feebly bisinuate; densely, minutely punctate. Elytra oblong, a little wider than the prothorax, obtuse at the apex; finely punctate-striate,

the interstices flat, densely punctulate, 1 faintly granulate. Ventral segment 1 depressed down the middle in the ♂. Legs rather short; femora bidentate.

Length $3\frac{1}{2}$ – $5\frac{2}{3}$, breadth $1\frac{1}{2}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Holm.*; *Mus. Brit.*; *Mus. Dresden*), Toxpam in Vera Cruz (*Sallé*); NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba (*Champion*).—SOUTH AMERICA, Cayenne¹, Brazil.

Thirteen specimens, agreeing with the type (♀) communicated by M. Severin. The long third joint of the funiculus, the trivittate prothorax, the mottled elytra, the narrow scales of the under surface, which is spotted with brown along the sides, and the almost equally bidentate femora, characterize *Z. maculipes*. The blackish-brown annulus on the posterior femora is placed near the middle, instead of at the apex as in *Z. trivittata*, *Z. sobrina*, and others. *Z. cinctipes*, Germ., is an allied form.

14. *Zygops cataleuca*, sp. n. (Tab. II. figg. 24, ♀; 24 a, hind leg.)

Zygops cataleuca, Chevr. in litt.

Oblong, black or piecous, the antennæ obscure ferruginous; thickly clothed with rather coarse scales: the upper surface mottled with fulvous (or brownish), white, and black, the fulvous scales clustered into spots along the sides and middle of the prothorax and into various patches on the elytra, the white scales sprinkled over the disc of the prothorax and condensed into small patches on the elytra; the under surface and legs (a blackish patch on the metathoracic episterna and another at the apex of the posterior femora excepted) white. Eyes very large, almost contiguous in front; rostrum moderately long, arcuate, rugulose and feebly carinate at the base; joint 2 of the funiculus nearly as long as 3–7 united, 3 about twice as long as 4. Prothorax transverse, narrowed in front, feebly bisinuate at the base; densely, minutely punctate. Elytra oblong, very little wider than the prothorax, obtuse at the apex; finely punctate-striate, the interstices flat, densely punctulate, 1 finely granulate. Ventral segment 1 broadly and shallowly depressed down the middle in the ♂. Legs rather short; anterior and intermediate femora unidentate, the posterior femora bidentate, the inner teeth long, the outer one small, narrow, and sometimes almost obsolete.

Length $4\frac{1}{4}$ – $6\frac{1}{5}$, breadth $1\frac{2}{3}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Holm.*; *Mus. Brit.*), Toxpam, Juquila (*Sallé*); NICARAGUA, Chontales (*Janson*).

Nine specimens, all but one from Mexico. Separable from *Z. trivittata* and *Z. sobrina* by the less flattened elytra, the much coarser vestiture, and the blackish patch on the metathoracic episterna. The small outer tooth on the posterior femora is sometimes wanting. The examples in the Sallé collection are labelled *Z. cataleuca*, Chevr.

15. *Zygops trivittata*, sp. n. (Tab. II. figg. 25, ♂; 25 a, hind leg.)

Oblong, piecous, the antennæ ferruginous; thickly clothed with small scales: the upper surface fuscous, mottled with cinereous, the cinereous scales on the prothorax condensed into three interrupted vittæ and those on the elytra into numerous short longitudinal streaks, which are here and there transversely coalescent, the under surface and legs almost entirely whitish, the posterior femora only with a large blackish patch at the apex. Eyes very large, almost contiguous in front; rostrum strongly arcuate, not extending beyond the intermediate coxæ, unicusinate and rugulose at the base; joint 2 of the funiculus nearly as long as 3–7 united, 3 about twice as long as 4. Prothorax transverse, subquadrate, narrowed

in front, feebly bisinuate at the base; densely, minutely punctate. Elytra oblong, very little wider than the prothorax, flattened on the disc, subtruncate at the apex; finely punctate-striate, the interstices flat, densely punctulate, 1 obsoletely granulate. Ventral segment 1 shallowly depressed along the middle in the ♂. Legs rather short; posterior femora sharply bidentate, the others unidentate.

Length $5\frac{1}{2}$ – $5\frac{1}{2}$, breadth $2\frac{1}{10}$ – $2\frac{1}{5}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Belt*).—BRAZIL (*Mus. Brit.*).

Four specimens from Nicaragua and one from Brazil, agreeing perfectly *inter se* *. The dense, uniform, whitish vestiture of the under surface, the comparatively short third joint of the funiculus, and the strongly bidentate posterior femora, separate *Z. trivittata* from the allied Central-American forms, *Z. sobrina* excepted. From *Z. leucogaster*, Desbr., the present species may be known by the larger cinereous patches on the elytra, the sharply unidentate anterior femora, and the unicolorous vestiture of the under surface †.

16. *Zygops sobrina*. (*Z. minuta*, Tab. II. figg. 26, ♀; 26 a, hind leg.)

♂. *Zygops sobrinus*, Gyll. in Schönh. Gen. Curc. iv. p. 622 ¹.

Zygops minuta (Jekel), Desbr. Bull. Soc. Ent. Fr. 1890, p. cxxvii ².

Very like *Z. trivittata*, but with the vestiture of the upper surface cinereous, fulvous, and black intermixed, the cinereous scales sometimes predominating, these latter condensed into an interrupted submarginal vitta or several spots on the prothorax and various small spots on the elytra, the black scales on the elytra clustered into a small spot on each side of the scutellum, an irregular patch near the suture at about the middle, and a few small scattered spots; the vestiture of the under surface dense and wholly white, that of the legs also white, the posterior femora with a broad blackish or brown patch at the apex above. The prothorax a little less parallel at the sides; the anterior and intermediate femora unidentate, the posterior pair sharply bidentate, the inner tooth long, the outer one short and triangular; the first ventral segment broadly depressed down the middle in the ♂.

Length 4–5, breadth $1\frac{3}{5}$ – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Toxпам, Juquila (*Sallé*); PANAMA, Tolé (*Champion*).—SOUTH AMERICA, Cayenne ², Amazons ², Brazil ¹.

Six specimens, all but one from Mexico, differing from the type of *Z. sobrinus* in having a distinct black spot on each side of the scutellum and a more deeply excavate first ventral segment in the male. This insect is apparently the *Z. minuta* of Jekel, to judge from a Cayenne example thus named in the Pascoe collection at the British Museum; Desbrochers, however, in his brief diagnosis ², says nothing about the black spot on either side of the scutellum (conspicuous in the paler individuals), nor does he mention the dark patch at the apex of the posterior femora. The third joint of the funiculus is short, as in *Z. trivittata*. The two teeth on the posterior femora are sharp. The vestiture of the under surface is uniformly white.

* In the British Museum there is a female specimen (without hind legs) of a nearly allied form from "Mexico," with a longer and more slender rostrum, longer antennæ, with a longer club, and spotted metasternal side-pieces. There are others like it from Brazil, unnamed, in the Fry collection.

† The type (♀) of *Z. leucogaster* has three large, sharply-defined, blackish-brown patches along the sides of the body beneath, the anterior femora obsoletely bidentate, &c.

HYPOPLAGIUS.

Hypoplagus, Desbrochers, Ann. Soc. Ent. Belg. xxxv. p. 40, nota (1891) ; Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 18.

The characters of this genus, described from an old mutilated specimen from Cayenne, may be given thus :—

Rostrum moderately stout, short, not longer than the head as seen in profile, depressed and slightly widened at the base, almost straight, the antennæ inserted behind the middle, joints 1 and 2 of the funiculus equal in length, 3 much shorter, not longer than 4, 6 and 7 transverse, the club small, acuminate-ovate, its first joint shorter than the others united; eyes large, oval, somewhat angular below, separated in front by fully half the width of the base of the rostrum, the intraocular space equal in width above and beneath; prothorax transverse, truncate in front, without ocular lobes; scutellum subtriangular, small; elytra oblong, obtuse at the apex; pygidium very short, covered by the elytra; mesosternum flat, declivous, the meso-metasternal suture straight and in a line with the middle of the widely-separated intermediate coxæ; metasternum long; ventral segments gradually ascending, the sutures almost straight, the second segment longer than 3 and 4 united; legs short, the posterior femora not reaching the apex of the abdomen, all the femora sublinear and unarmed.

Hypoplagus includes a single species, peculiar to Eastern Mexico, Guiana, and Brazil, so far as at present known. It is very like a small, short-legged *Zygops*, but the pygidium is short and hidden, the rostrum and antennæ are differently formed, the femora are unarmed, &c.

1. *Hypoplagus pectoralis*. (Tab. II. fig. 27, 27 a, b, ♂.)

Hypoplagus pectoralis, Desbr. Ann. Soc. Ent. Belg. xxxv. p. 40¹.

Oblong, flattened above, convex beneath, opaque, nigro- or rufo-piceous, the legs reddish, the antennæ ferruginous; thickly clothed above and beneath with minute, hair-like, yellowish-cinereous or fulvous scales, the meso- and metasternum with coarser fulvous scales. Head rugulosely punctate, slightly depressed between the eyes; rostrum finely carinate, rugulosely punctate in the ♂, more sparsely punctate and shining at the tip in the ♀. Prothorax constricted and narrowed in front, and also a little narrowed behind, bisinuate at the base; densely, rugulosely punctate, not or faintly carinate. Elytra oblong, a little wider than the prothorax; shallowly striate, the interstices almost flat and densely rugulose.

Length 5-6½, breadth 2-2½ millim. (♂ ♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*).—SOUTH AMERICA, Cayenne, Pará.

Three immature specimens, agreeing with the type communicated by M. Severin, of the Brussels Museum, and with others from Cayenne and Pará in the British Museum. No locality was given by Desbrochers¹.

HELLERIELLA, gen. nov.

Rostrum about as long as the head and prothorax, feebly curved, cylindrical and rather slender, much widened towards the base, sulcate along the sides beneath, the antennæ inserted at about the basal fourth, joints 1 and 2 of the funiculus long, subequal in length, 3 and 4 much shorter, the club ovate, small, its basal joint as long as the others united; eyes large, separated by more than half their width as seen from above, sinuato-acuminate below; prothorax cylindrical, long, truncate at the apex, feebly sinuate at the base, the ocular lobes almost obsolete; scutellum very small, convex; elytra comparatively short, oblong-cordate; pygidium not visible; intermediate coxæ narrowly separated; mesosternum flattened; metasternum short; ventral segments gradually ascending, 1 very long, 2 three times as long as 3 or 4;

legs short and stout, the posterior femora not reaching beyond the second ventral suture; femora very stout, clavate, deeply sulcate at the apex beneath, and each armed with a short triangular tooth; third tarsal joint short, broadly bilobed, the claws very small.

This genus includes a remarkable form from Eastern Mexico, chiefly characterized by its elongate cylindrical prothorax, narrowly separated intermediate coxæ, and short stout legs. It is not very closely related to any of the genera enumerated or described by Dr. Heller, after whom I have dedicated it.

1. *Helleriella longicollis*, sp. n. (Tab. II. figg. 28, 28 a.)

Elongate, flattened above, moderately convex beneath, black, the rostrum (except at the base) and antennæ ferruginous; thickly clothed with small narrow scales, those on the under surface and on the first elytral fascia coarser; the head between the eyes, the prothorax with the sides, base, and apex, and a line down the middle, and the elytra with the base and suture narrowly, a small spot at the apex, and a sinuous, interrupted post-median fascia, whitish, with a few fulvous scales intermixed, each elytron also with a broad, curved, fulvous fascia below the base, the rest of the upper surface blackish, the legs and under surface entirely whitish. Head rugulosely punctate; rostrum sparsely punctate and shining, the dilated basal portion rugulose and squamose. Prothorax longer than broad, feebly constricted at the apex; closely punctate. Elytra a little wider than the prothorax, and less than twice its length, conjointly rounded at the apex; densely rugulose, finely and shallowly punctate-striate. Ventral segment 1 slightly depressed down the middle.

Length $4\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (σ ?)

Hab. MEXICO, Vera Cruz (*Sallé*).

One specimen.

TIMORUS.

Timorus, Schönherr, Gen. Curc. iv. p. 680 (1838); Lacordaire, Gen. Col. vii. p. 154; Chevrolat, Bull. Soc. Ent. Fr. 1879, p. lxxi; Heller, Abhandl. Mus. Dresd. no. 11, pp. 4, 60.

This genus includes a few conspicuous Tropical-American forms, one of which has been recorded from Mexico; the last-mentioned locality, however, requires confirmation. *Timorus* is related to *Copturus*, differing from it in the relative lengths of the first two joints of the funiculus, the coarse vestiture, &c.

1. *Timorus suturalis*. (Tab. III. figg. 1, 1 a, var.)

Timorus suturalis, Ros. in Schönh. Gen. Curc. iv. p. 681¹; Lacord. Gen. Col. vii. p. 154, Atlas, t. 74. figg. 6, 6 a²; Chevr. Bull. Soc. Ent. Fr. p. lxxii³; Heller, Abhandl. Mus. Dresd. no. 11, p. 60⁴.

Timorus tuberculosus, M. C., in Mus. Vind. Cæs.⁵

Timorus tuberculatus, Heller, loc. cit. p. 60 (sine deser.)⁶.

Hab. ? MEXICO^{5 6}.—BRAZIL¹⁻⁵.

Two specimens of a *Timorus* in the Vienna Museum (kindly communicated by Custos L. Ganglbauer), one labelled "Brazil" and the other "Mexico," seem to belong to Rosenschöld's species, though they differ from Lacordaire's figure of *T. suturalis*, and from the examples of that insect in the British Museum, in having the elytra more strongly tuberculate. We take the opportunity of figuring the "Mexican" specimen.

BIOL. CENTR.-AMER., Coleopt., Vol. IV. Pt. 5, August 1906.

FF

PHILEAS, gen. nov.

Antennæ inserted at the middle of the rostrum, joints 1 and 2 of the funiculus equal in length, 3-7 shorter, decreasing in length, the club ovate, with joint 1 about as long as the others united; rostrum stout, arcuate, short, not longer than the prothorax as seen in profile; eyes oval, somewhat pointed beneath, distant, the intra-ocular space widening upwards; prothorax short, deeply bisinuate at the base, truncate at the apex, without definite ocular lobes, the basal lobe subtruncate; scutellum exposed; elytra about one-half wider than the prothorax, sinuate at the base, blunt at the apex; pygidium not visible; mesosternum vertical, flat, the metasternum extending forwards between the coxæ to meet it; ventral segments ascending, 1 and 2 convex, 2 at the sides about as long as 3 and 4 united; legs short and stout; femora unidentate, the intermediate and posterior pairs compressed, the posterior pair carinate on their outer edge, tibial claw long and stout, third tarsal joint short, broadly bilobed, tarsal claws small; body robust, sparsely squamose.

Type, *P. granulatus*.

A single species from the mountains of Western Mexico—the unique example of which has been injured in an attempt to pin it, owing to its very hard integument—is referred to this genus. The short rostrum, prothorax, and legs, the broad elytra, the widely separated eyes, the shorter first joint of the antennal club, &c., separate it from *Timorus*.

1. *Phileas granulatus*, sp. n. (Tab. III. figg. 2, 2 a, b.)

Subovate, broad, robust, black; the vestiture rather sparse and fine, denser and almost entirely ochreous on the head, rufo-ferruginous on the prothorax and rostrum, and rufo-ferruginous intermixed with cinereous on the other portions of the body, as well as upon the legs, the elytra each with an oblique velvety-black patch on the suture below the base (the two patches united forming a Λ -shaped mark) and a small black spot in a line with the lower part of it near the margin, the latter preceded by an indefinite transverse ochreous patch; the intermixed cinereous scales on the elytra and under surface minute and hair-like, the red scales small, oval, those on the prothorax elongate. Head densely punctate, depressed between the eyes; rostrum densely, rugulose punctate to the tip, finely carinate down the middle. Prothorax rather convex, strongly transverse, rounded at the sides, narrowed in front, densely, rugulose punctate, the anterior portion tubulate, the posterior portion sharply carinate. Elytra about one-half wider than the prothorax, somewhat dilated at the sides below the base, and gradually narrowing thence to the apex, flattened on the disc; with sinuous rows of small punctures, the interstices rugulose, more or less raised, and subseriate-granulate (except near the anterior part of the suture), 3, 5, 7, and 9 rather more prominent than the rest. Beneath and the legs densely, rugulose punctate.

Length $6\frac{2}{3}$, breadth $3\frac{2}{3}$ millim. (♀?)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

LARIDES, gen. nov.

Antennæ inserted at the middle of the rostrum, joints 1 and 2 of the funiculus equal in length, 3-7 short, the club stout, ovate, with joint 1 as long as the others united; rostrum stout, arcuate, short, barely longer than the prothorax as seen in profile; eyes elliptic, distant, the intra-ocular space concave, subtriangular, rapidly widening upwards; prothorax short, feebly sinuate at the base and apex, with broadly rounded, feeble, ocular lobes; elytra short, subtruncate at the base, blunt at the apex; pygidium not visible; mesosternum declivous, unimpressed; intermediate coxæ widely separated; ventral segments ascending, 2 about as long as 3 and 4 united; legs short and moderately stout, femora unidentate, the intermediate

and posterior pairs compressed, tibial claw long, third tarsal joint short, broadly bilobed, tarsal claws small; body elliptic, robust, squamose.

Type, *L. cavifrons*.

The single species referred to this genus is nearly related to *Phileas*, differing from it in having the eyes less acuminate below and more widely separated above, the antennal club shorter and relatively stouter, and the prothorax and elytra subtruncate at the base.

1. *Larides cavifrons*, sp. n. (Tab. III. figg. 3, 3 *a*, *b*.)

Oblong, subovate, nigro-piceous, the antennæ and the tips of the tarsi ferruginous; thickly clothed with small pale brown and whitish scales, the prothorax and under surface with larger scales, the intra-ocular space ochraceous, with a small fulvous spot on each side, the whitish scales on the elytra condensed into two interrupted fasciæ, the posterior one subapical, the anterior one angulate and with an oblique ramus extending forwards to the base of the second interstice, the triangular space between the common, Λ -shaped mark and the short apical declivity fulvous spotted with black, the femora variegated with whitish above. Rostrum rugulosely punctate to the tip, finely carinate. Prothorax about one-half broader than long, rounded at the sides, narrowed and strongly constricted in front, the anterior lobe tubulate, the posterior lobe rather convex and with a very sharp median carina in front; densely punctate. Elytra wider than the prothorax, gradually narrowing from a little below the base, the produced apical portion short, bluntly rounded; finely punctate-striate, the interstices broad, 3, 5, 7, and 9 more or less raised and undulate. Ventral segment 5 depressed in the middle at the apex.

Length $3\frac{1}{4}$, breadth $1\frac{3}{8}$ millim. (σ .)

Hab. GUATEMALA, Capetillo (*Champion*).

One specimen, in perfect condition.

CYLINDROCOPTURUS.

Cylindrocopturus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 4, 56 (1895).

Paratimorus, Heller, loc. cit. pp. 4, 58.

Copturodes, Casey, Ann. N. York Acad. Sci. ix. pp. 667, 669 (1897) *.

A genus including numerous representatives from the Southern United States and Mexico, and an aberrant form from Guatemala. The new species now added show that *Paratimorus* cannot be retained, the longer and straighter rostrum of *P. ganglbaueri* being a character of no importance and probably peculiar to the female sex. The Mexican representatives, like those of North America, are densely clothed above with coarse, overlapping scales, rounded on the elytra and oval or oblong on the prothorax, which almost hide the sculpture. The unarmed femora &c. separate *Cylindrocopturus* from *Timorus*. An allied monotypic genus, *Gyrotus*, with acute post-ocular processes to the prothorax, has been described by Casey; it is from California.

* The name *Copturodes* has already been sunk as a synonym, cf. Casey, Canad. Ent. 1904, p. 324.

- a.* Elytra separately produced at the apex, the apices truncate or dentiform and often raised.
- a*¹. Species larger, with moderately long legs. [PARATIMORUS, Heller.]
- a*². Elytral vestiture coarse and overlapping, the apices not produced into a sharp spine.
- a*³. Elytra with scattered clusters of raised scales, forming tuberculiform prominences, spotted; prothorax fulvous at the sides . . . *ganglbaueri*, Heller.
- b*³. Elytra without tuberculiform prominences, arcuato-fasciate, the interstices here and there slightly swollen and setose; prothorax not fulvous at the sides . . . *triangulifer*, sp. n.
- c*³. Elytra flattened, without raised scales or setæ, the suture and two oblique radiating lines on each side of it fulvous or white; prothorax in great part fulvous . . . *biradiatus*, sp. n.
- b*². Elytral vestiture sparse and fine, the apices produced into a sharp point . . . *bicaudatus*, sp. n.
- b*¹. Species smaller, with shorter legs; elytral vestiture coarse and overlapping. [CYLINDROCOPTURUS, Heller.]
- c*². Second ventral segment with two conspicuous conical prominences*.
- d*³. Prothorax with a cluster of erect fulvous scales in front, the sides broadly white; elytra each with a triangular black patch on the disc, the sides angularly dilated before the apex . . . *tetralobus*, sp. n.
- e*³. Prothorax without erect scales in front, the sides with a broad white patch behind; elytra with a common $\wedge$ -shaped pallid line below the base, the sides not dilated near the apex . . . *armatus*, sp. n.
- d*². Second ventral segment with the prominences indistinct or wanting.
- f*³. Prothorax narrower than the elytra.
- a*⁴. Prothorax with a large white patch at the sides behind; elytra with a common $\wedge$ -shaped pallid line below the base, the apices dentiform . . . *imbricatus*, sp. n.
- b*⁴. Prothorax and elytra spotted with white, the elytra each with a transverse fulvous patch below the base, the apices obliquely truncate . . . *albonotatus*, sp. n.
- c*⁴. Prothorax interruptedly albo-trivittate, the elytra with two curved series of white spots, the apices truncate . . . *adpersus*, Lec.
- g*³. Prothorax and elytra subequal in width; prothorax albo-vittate on each side, the elytra bifasciate . . . *bifasciatus*, sp. n.
- b.* Elytra conjointly rounded at the apex, the interstices not wider than the striae.
- c*¹. Upper surface with large scales; elytra each with a transverse or oblique black patch: larger, body elongate-elliptic . . . *elongatus*, sp. n.
- d*¹. Upper surface with smaller scales; prothorax with a large pallid patch at each angle; elytra mottled: smaller, body oblong-elliptic . . . *scaphiformis*, sp. n.

* Possibly a sexual character.

1. *Cylindrocopturus ganglbaueri*. (Tab. III. figg. 4, 4 a, ♀.)

Paratimorus ganglbaueri, Heller, Abhandl. Mus. Dresd. no. 11, p. 58, tab. figg. 22, 44¹.

Hab. MEXICO, Guanajuato, Orizaba (*Sallé*), Guadalupe, Chapultepec, &c. (*Bilimek*, *Mus. Vind. Cæs.*¹).

We have three specimens of this species from the *Sallé* collection, agreeing with an example communicated by Dr. Heller. It is a close ally of *C. triangulifer*, differing from that insect in the more uneven upper surface, the fulvous sides of the prothorax, &c. The prothorax has a more or less distinct, abbreviated, median carina. The examples seen are probably all females.

2. *Cylindrocopturus triangulifer*, sp. n. (Tab. III. figg. 5, 5 a, b, ♂.)

Oblong-elliptic, flattened above, black, the antennæ (the club excepted) ferruginous; the upper surface variegated with a dense clothing of coarse, rounded, overlapping, cinereous (or white) and brownish scales (fig. 5 b), and also thickly set with short, coarse, erect setæ: the elytra each with a transverse, subtriangular, brown or blackish patch at about the middle of the disc, which is followed, and sometimes preceded, by an oblique whitish line, the suture also whitish, the seriate punctures each with a narrow scale, the elytral setæ sometimes clustered into small fascicles; the scales on the under surface paler, often almost entirely white down the middle; the legs densely squamose and setulose. Eyes separated by fully half their width as seen from above. Rostrum (♂) strongly arcuate, not reaching beyond the anterior coxæ, rugulosely punctate, unicarinate, and squamose to near the tip, (♀) slightly longer and straighter, and with the apical half or two-thirds bare, shining, and sparsely, very minutely punctate. Elytra considerably wider than the prothorax, narrowed from about the basal third, transversely depressed at the base and beyond the middle, the apices flattened and produced; finely punctate-striate, the outer interstices somewhat convex. Ventral segments 1 and 2 broadly and feebly depressed down the middle, and 5 subtruncate at the apex, in the ♂.

Var. The prothorax with three narrow whitish vittæ; the elytra each with a large velvety-black, transverse, triangular patch, followed by a white line, the suture in great part white; the short setæ of the upper surface mostly black.

Length $4\frac{1}{2}$ –6, breadth $2\frac{1}{10}$ – $2\frac{2}{10}$ millim. (♂ ♀.)

Hab. MEXICO (*Sallé*), Omilteme 8000 feet (*H. H. Smith*), Tapachula (*Höge*); GUATEMALA, Dueñas (*Champion*).

Ten specimens, five of which are from Guatemala; the variety is from Omilteme. Very like *C. ganglbaueri*, but with a shorter and more curved rostrum in the female, the rostrum of the male not longer than in the species of the genus *Cylindrocopturus* and squamose to near the tip, the upper surface setose, &c. The scales vary in colour: the triangular, transverse, dark patch on the elytra, followed by an oblique whitish line, is, however, characteristic. The antennæ are inserted at the middle of the rostrum in the male, and at a little nearer the base in the female.

3. *Cylindrocopturus biradiatus*, sp. n. (Tab. III. figg. 6, 6 a, ♀.)

Oblong-elliptic, flattened above, very convex beneath, black; the upper surface variegated with a dense clothing of coarse, rounded, overlapping scales, the seriate punctures of the elytra each with a piliform scale: the head and prothorax in great part fulvous, the prothorax with a triangular blackish patch on the posterior portion of the disc, divided down the middle by a white line, the sides also with a white

patch at the base beneath, the elytra black, with the apex, the suture thence to near the scutellum, and a short streak at the base of the second interstice, fulvous, and two oblique, radiating streaks extending outwards from the sutural stripe white, the under surface white, mottled with fulvous along the sides, the legs fulvous and white intermixed. Head with a smooth raised line on the vertex; eyes well-separated; rostrum arcuate, reaching to a little beyond the middle coxæ, rugulose and carinate at the base, and sparsely, minutely punctate thence to the tip. Prothorax broader than long, abruptly narrowed and constricted in front, the sides subparallel behind; densely punctate. Elytra a little wider than the prothorax, slightly rounded at the sides, the humeri rather prominent, the apices raised and separately, angularly produced; deeply punctate-striate, the interstices feebly convex, broader than the striæ. Legs moderately long.

Length 4, breadth 2 millim. (♀.)

Hab. MEXICO, Puebla (*Sallé*).

One specimen, in perfect condition. This species may be known by the abruptly narrowed, fulvous prothorax, which has a dark triangular patch on the disc, divided by a white line, and the feebly bicaudate elytra, which have each two white lines radiating from the fulvous sutural stripe.

4. *Cylindrocopturus bicaudatus*, sp. n. (Tab. III. figg. 7, 7a, ♂.)

Oblong, flattened above, piceous, the antennæ and rostrum more or less ferrugineous; the elytra and legs rather sparsely clothed with minute, hair-like, flavo-cinereous scales, the vestiture of the rest of the surface coarser and denser, rust-red on the head and prothorax (the scales on the latter oblong-ovate, transversely arranged, and not quite reaching the bare median streak), and almost wholly white or ochreous beneath. Head densely punctate, the vertex with a smooth median line; eyes narrowly separated, the intra-ocular space widening above and below; rostrum almost straight, about as long as the head and prothorax, rugulose punctate to the tip, a little longer and smoother in the ♀. Prothorax slightly broader than long, gradually narrowing from the base, feebly constricted in front; densely punctate and obsoletely carinate. Elytra wider than the prothorax, arcuately narrowing from about the middle, each armed with a long, upturned, spiniform process at the apex in a line with the second interstice, the humeri somewhat swollen; shallowly punctate-striate, the interstices flat, densely rugulose, the vestiture uniform with that of the striæ. Legs moderately long.

Length $4\frac{1}{2}$ –5, breadth $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, Capetillo, Zapote (*Champion*).

One pair. Separable from all its allies by the strongly bicaudate elytra, the vestiture of which is sparse and fine, and the rust-red, transversely-arranged scales on the prothorax.

5. *Cylindrocopturus tetralobus*, sp. n. (Tab. III. figg. 8, 8a.)

Oblong-elliptic, depressed above, black; the upper surface variegated with a dense clothing of coarse, rounded, overlapping scales, the seriate punctures on the elytra each with a hair-like scale: the head fulvous; the prothorax with the sides broadly, and two transverse interrupted fasciæ extending across the middle, white, the rest of the disc brown, the anterior lobe fulvous and with a cluster of erect, similarly-coloured scales in the centre; the elytra variegated with fulvous and white (the white scales mostly condensed into a cruciform patch at the middle of the suture and a small spot on the shoulders), and each with a sharply-defined triangular black patch at the middle of the disc, the fifth interstice at its point of termination, and the apices, each with a cluster of semierect fulvous scales; the under surface and legs white, with a few fulvous scales intermixed. Head with a fine median carina; eyes well separated; rostrum reaching to the middle of the intermediate coxæ, rugulose and carinate at the base. Prothorax transverse, constricted

and narrowed in front, and also a little narrowed behind; densely, rather coarsely punctate. Elytra slightly wider than the prothorax, somewhat rounded at the sides, transversely depressed at the base and uneven thence to near the apex, the apices raised and separately produced, angularly dilated at the sides; finely punctate-striate, the interstices rather convex. Second ventral segment with two conical squamigerous prominences at the apex. Legs short.

Length $3\frac{1}{4}$, breadth $1\frac{1}{2}$ millim.

Hab. MEXICO, Colima City (*Höge*).

One specimen, apparently a female, the ventral tubercles notwithstanding. The tuft of erect fulvous scales at the middle of the anterior margin of the prothorax, the bilobate apex of each elytron, and the cluster of erect fulvous scales at the apex of the fifth interstice, separate *C. tetralobus* from *C. armatus*.

6. *Cylindrocopturus armatus*, sp. n. (Tab. III. figg. 9, 9 a.)

Oblong-elliptic, flattened above, black; the upper surface with a dense clothing of coarse, overlapping, oval and rounded scales, the seriate elytral punctures each with a narrow piliform scale: the head brown, spotted with white, the prothorax brown, variegated with fulvous and white, and with a large, broad, subquadrate, white or fulvous patch on each side behind, the elytra brown, variegated with fulvous, black, and white, the white scales condensed into a transverse spot at the shoulder, a short streak behind the scutellum, a common transverse line on the interstices 2-4 at about one-third from the apex, a rather large lateral spot opposite the first ventral segment, and another at the apex, the fulvous scales condensed into an oblique streak on the disc below the base (extending outwards from the scutellar spot to the fifth stria), which is followed by a blackish triangular patch; the vestiture of the under surface and legs fulvous and white intermixed. Eyes well-separated; rostrum rugulose and subearinate at the base. Prothorax transverse, narrowed and strongly constricted in front; densely punctate. Elytra slightly wider than the prothorax, somewhat rounded at the sides, the apices thickened and separately produced; finely punctate-striate, the interstices feebly convex. Second ventral segment with two conical squamigerous prominences at the apex. Legs short.

Length $3\frac{1}{10}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim.

Hab. MEXICO, Amula and Chilpancingo in Guerrero 4600–7000 feet (*H. H. Smith*).

Two specimens, perhaps male and female, one having the rostrum a little smoother than the other. This insect agrees very nearly with the description of *C. mammillatus*, Lec., from Southern California, differing from it in having a common, fulvous and white, $\wedge$ -shaped line on the elytra below the base and a transverse white line beyond the middle, as well as in its smaller size, &c.

7. *Cylindrocopturus imbricatus*, sp. n. (Tab. III. fig. 10.)

Oblong-elliptic, flattened above, black; the upper surface variegated with a dense clothing of coarse, overlapping, oval and rounded, sordid-ochreous, whitish, and blackish-brown scales, the seriate elytral punctures each with an arrow scale: the prothorax with a very large, rounded, whitish patch on each side at the base, the elytra with a small, rhomboidal, blackish patch crossing the suture at one-third from the base, preceded by a short, oblique, ochreous fascia, the suture in part, a small spot at the shoulder, one on the fourth intersticio towards the apex, another on the eighth nearer the base, and a transverse lateral patch opposite the first ventral segment, white, the apices ochreous; the vestiture of the legs and under surface almost wholly whitish, the femora faintly fusco-annulate. Eyes narrowly separated in front. Rostrum rugulose and finely carinate at the base, almost smooth thence to the tip. Prothorax transverse, narrowed and constricted in front, and slightly narrowed behind; densely punctate. Elytra somewhat rounded at the sides, the apices raised and separately produced, the third interstice terminating

in a long, dentiform process; deeply punctate-striate, the punctures of the striae becoming very coarse towards the sides, the interstices feebly convex. Second ventral segment with two indistinct prominences. Legs short.

Length $3\frac{1}{2}$, breadth $1\frac{2}{3}$ millim. (♀.)

Hab. MEXICO, Acapulco (*Höge*).

One specimen. This insect, at first sight, was supposed by me to be the female of *C. armatus*, but this cannot be the case: the eyes are more approximate in front, the seriate punctures of the elytra are much coarser towards the sides, the apices are dentiform, the vestiture is uniformly whitish beneath, the blackish rhomboidal patch on the elytra is much smaller, &c.

8. *Cylindrocopturus albonotatus*, sp. n. (Tab. III. figg. 11.)

Elliptic, flattened above, nigro-piceous; the upper surface variegated with a dense clothing of oval and rounded, overlapping, fulvous, white, and dark brown scales, the seriate elytral punctures each with a narrow scale: the head fulvous; the prothorax fulvous, with a large subquadrate patch on each side behind, extending obliquely inwards anteriorly, and a narrow, abbreviated, median vitta, white; the elytra with a spot at the shoulder, another near the suture below the base, a sinuous, interrupted, post-median fascia (extending forwards along the suture), and the apex, white, and a short transverse fascia on the disc below the base (in a line with the first white spot) fulvous; the vestiture of the under surface and legs white, the femora faintly fusco-annulate. Eyes rather narrowly separated, the intra-ocular space widening above and beneath. Rostrum rugulose and feebly carinate at the base. Prothorax transverse, constricted and narrowed in front, the sides parallel behind; densely punctate. Elytra a little wider than the prothorax, rounded at the sides, the apices raised and separately, angularly produced; deeply punctate-striate, the interstices narrow, raised, about as wide as the striae. Legs short.

Length $3\frac{1}{4}$ – $3\frac{2}{3}$, breadth $1\frac{2}{3}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*), Cordova (*Höge*).

Two specimens, one of them in perfect condition. The short, transverse (not oblique), fulvous fascia on the disc of the elytra below the base, the somewhat tricruciate white sutural stripe, and the subquadrate large white patch on each side of the prothorax at the base, and the white under surface, distinguish *C. albonotatus*. The scales are smaller than in *C. imbricatus*.

9. *Cylindrocopturus adspersus*. (Tab. III. fig. 12.)

Copturus adspersus, Lec. Proc. Am. Phil. Soc. xv. p. 262¹.

Cylindrocopturus adspersus, Heller, Abhandl. Mns. Dresd. no. 11, p. 57².

Copturodes adspersus, Casey, Ann. N. York Acad. Sci. ix. pp. 670, 672³.

Hab. NORTH AMERICA, Colorado³, Texas^{1 3}, and Arizona³.—MEXICO, Northern Sonora (*Morrison*).

Sent to us by Morrison as from Sonora, and by Wickham from Utah, Colorado, and Texas (Brownsville). The white spots on the prothorax are sometimes coalescent into three vittae; the two curved series of white spots on the elytra vary somewhat in extent, the intervening portion of the suture being bordered with white.

10. *Cylindrocopturus bifasciatus*, sp. n. (Tab. III. fig. 13.)

Oblong-elliptic, narrow, flattened above, black, the rostrum reddish; the upper surface variegated with a dense clothing of overlapping, oval and rounded, brown, ochreous, and whitish scales, the seriate elytral punctures each with a hair-like scale: the prothorax with a spot in the middle at the base and a sinuous vitta on each side white, the elytra each with a conspicuous spot at the base of the seventh interstice, a rather broad curved fascia at about the basal third, a short transverse fascia beyond the middle, a spot at the apex, and an oblique lateral patch opposite the first ventral segment, white or ochreous; the under surface and legs with intermixed brownish and white scales. Eyes well-separated. Rostrum arcuate, rather coarsely punctate, carinate and rugulose punctate at the base. Prothorax as wide as the elytra, not much broader than long, somewhat rounded at the sides, narrowed and constricted in front and slightly narrowed behind; densely punctate. Elytra subparallel at the base, the apices obtuse and slightly produced; finely punctate-striate, the interstices feebly convex. Legs short.

Length 3, breadth $1\frac{1}{4}$ millim. (σ .)

Hab. MEXICO, Durango City (*Champion*).

One specimen. Differs from the other Mexican forms in having the prothorax and elytra almost equal in width. The submarginal white vittæ on the prothorax extend on to the base of the elytra; the arcuate fascia on the latter is ochreous, becoming white towards the suture.

11. *Cylindrocopturus elongatus*, sp. n. (Tab. III. figg. 14, 14 a, b, σ .)

Elongate-elliptic, flattened above, black; the upper surface variegated with a dense clothing of coarse, rounded, overlapping, whitish, black (or fuscous), and fulvous scales, the blackish scales condensed on each elytron into a broad transverse or oblique fascia at about the middle of the disc and an irregular fascia between this and the apex, the seriate punctures each with a narrow scale; the vestiture of the under surface and legs coarse, dense, and whitish, the femora more or less fusco-variegate along their outer half. Eyes very narrowly separated in front, the intra-ocular space widening upwards. Rostrum (σ) arcuate, carinate, rugulose, and squamose to about the middle, and finely punctate thence to the tip, (φ) a little longer and smoother. Prothorax about as long as broad, gradually narrowing from near the base, feebly constricted in front; densely punctate. Elytra slightly wider than the prothorax, oblong-oval, the apices conjointly rounded and slightly produced; deeply punctate-striate, the interstices equally convex throughout, narrow, very little wider than the striæ. Anterior coxæ with a conical prominence.

Length $4\frac{1}{2}$ – $5\frac{3}{4}$, breadth $1\frac{1}{8}$ – $2\frac{1}{10}$ millim. (σ φ .)

Hab. MEXICO, Acapulco, Chilpancingo, Iguala, Jalapa (*Höge*).

Six specimens. Recognizable by its elongate form, long prothorax, and equally convex elytral interstices, the latter not wider than the striæ. The interrupted blackish fasciæ of the elytra are sharply defined.

12. *Cylindrocopturus scaphiformis*, sp. n. (Tab. III. fig. 15.)

Oblong-elliptic, narrow, flattened above, nigro-piceous or piceous, the antennæ, tibiæ, and tarsi obscure ferruginous; the upper surface variegated with a dense clothing of rounded, overlapping, fulvous, white, and brown scales, the seriate elytral punctures each with a narrow scale: the prothorax with a fulvous or whitish patch on each side at the base and apex, the elytra with a transverse fulvous patch on the disc below the base, and an irregular dark fascia below it, the suture, base, and some transverse or oblique marks towards the apex, whitish; the vestiture of the under surface in great part white, the flanks of the prothorax fulvous in one specimen, the legs also white, the femora mottled with fulvous above. Eyes narrowly separated, the intra-ocular space almost equal in width throughout. Rostrum

carinate and rugulose at the base. Prothorax transverse, gradually narrowing from the base, feebly constricted in front; densely, finely punctate. Elytra very little wider than the prothorax, somewhat oval, the apices conjointly rounded; deeply punctate-striate, the interstices narrow, raised. Legs short. Length $2\frac{1}{2}$ -3, breadth $1\frac{1}{10}$ - $1\frac{1}{5}$ millim.

Hab. MEXICO, Chilpancingo (*H. H. Smith*), Cuernavaca (*Höge*), Guanajuato (*Sallé*, in *Mus. Dresden*).

Three specimens, varying a little in the colour of the scales. Smaller and less elongate than *C. elongatus*, the scales smaller, the prothorax much shorter and more finely punctate, the intra-ocular space narrower and almost equal in width, the elytra without well-defined black patch on the disc.

ZYGOPSELLA, gen. nov.

Antennæ inserted near the middle of the rostrum, joints 1 and 2 of the funiculus equal in length, 3-7 short, 6 and 7 transverse, the club narrow, acuminate-ovate, with the first joint as long as the others united; rostrum arcuate, rather stout, extending to a little beyond the anterior coxæ, widened towards the base; eyes moderately large, well-separated, acuminate below; prothorax transverse, bisinuate at the base, without ocular lobes; scutellum rounded; elytra rounded-triangular, separately lobate at the apex; pygidium not visible; mesosternum flattened, declivous; mesothoracic epimera narrow, ascending; ventral segments ascending, 2 as long as 3 and 4 united; legs stout, femora each with a small tooth, the posterior pair reaching to a little beyond the apex of the elytra and subcarinate on their outer edge, tibial claw stout, tarsal claws minute.

Type, *Z. ruficauda*.

The single species from which the above characters are taken is nearly related to *Archocopturus*, differing from it in the much smaller, inferiorly acuminate eyes, the narrow, acuminate antennal club, and the equally unidentate femora. The prothorax has a few reflected metallic-green spots, as in *A. regalis*.

1. *Zygopsella ruficauda*, sp. n. (Tab. III. figg. 16, 16 a.)

Elliptic, robust, nigro-piceous or black, the antennal scape, the first joint of the funiculus, and the apical lobes of the elytra ferruginous; above sparsely clothed with rather coarse, narrow, fulvous scales, the prothorax with a few reflected metallic-blue and green spots arising from the punctures; the elytra each with an arcuate median fascia, extending obliquely forwards to the base of the first interstice, a small patch near the middle of the suture, the suture itself thence to the base, a sharply-defined oblong spot on the fourth interstice at about one-third from the apex, and an indistinct humeral patch, white, the fulvous scales subseriately arranged and condensed into a stripe along the posterior half of the suture; the under surface with coarse, rounded, white scales, variegated with fulvous along the sides, the legs fulvous, mottled with white. Head densely punctate, depressed between the eyes above, the latter separated by about one-third of their own width; rostrum rugulose and subcarinate at the base, and sparsely punctate thence to the tip. Prothorax much broader than long, rounded at the sides, narrowed and strongly constricted in front; coarsely, densely punctate, the disc transversely convex and with a sharp, arcuate, median carina. Elytra wider than the prothorax, conjointly rounded at the apex, the apices each armed with a flattened, stout, blunt, dentiform process; crenate-striate, the interstices narrow, raised.

Length $2\frac{1}{5}$ -3, breadth $1\frac{1}{2}$ - $1\frac{3}{5}$ millim.

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*).

Two specimens, probably male and female. In this insect the white scales on

the basal portion of the elytra are condensed into a common sagittiform patch; the metallic spots on the prothorax are almost wanting in one example.

ARCHOCOPTURUS.

Archocopturus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 4, 56 (1895).

The type of this genus is *A. regalis* (Boh.), a common and widely distributed insect in Tropical America. Its chief characters are:—The very large approximate eyes, separated by a narrow lanciform space above, the basally widened rostrum, the subequal first and second joints of the funiculus, the narrow antennal club, with rather long second joint, and the sharply unidentate posterior femora. The prothorax is variegated with brilliant metallic-green.

1. *Archocopturus regalis*. (Tab. III. fig. 17.)

Copturus regalis, Boh. in Schönh. Gen. Curc. viii. 2, p. 105¹.

Archocopturus regalis, Heller, Abhandl. Mus. Dresd. no. 11, p. 56².

Zygops ornaticollis, Dej. in litt.³.

Zygops viridicollis, Desbr. in litt.⁴.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); GUATEMALA, Pantaleon, Pacific slope (*Champion*); NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba, Tolé (*Champion*).—SOUTH AMERICA, Cayenne^{1 2}, Amazons², Peru², &c.

PHILENIS, gen. nov.

Antennæ inserted near the base of the rostrum, joints 1 and 3 of the funiculus subequal in length, 2 about one-half longer than 1, 4–7 decreasing in length, 7 transverse, the club small, narrow, acuminate-ovate, with its basal joint scarcely so long as the others united, the second joint half the length of the first; rostrum rather slender, almost straight (curved in *P. fuscifemorata*), depressed at the base, flattened at the tip; head small, the eyes large, elliptic, subcontiguous, and occupying the whole of the front of the head; prothorax transverse, subconical, bisinuate at the base, truncate at the apex, without ocular lobes, the median lobe truncated; scutellum small, exposed; elytra rounded-subquadrate, much wider than the prothorax; pygidium covered or narrowly exposed; mesosternum subvertical, separated from the sloping anterior portion of the metasternum by an arcuate suture; mesothoracic epimera broad, ascending; ventral segments ascending, 2 as long as 3 and 4 united; posterior femora extending to a little beyond the apex of the elytra, feebly unidentate, without carina on their outer face, the two other pairs unarmed.

Type, *P. flavipes*.

The two species belonging to this genus are closely related to *Copturus*, in its restricted sense; but they differ from it in having the rostrum slender, scarcely widened at the base, the antennæ short and very slender, with a small, narrow, acuminate club, the posterior femora only dentate.

1. *Philenis flavipes*, sp. n. (Tab. III. figg. 18, 18 a.)

Subovate, robust, flattened above, the head and prothorax in great part black, the scutellum and elytra brown, the latter blackish towards the apex, the metasternum (except at the sides), the ventral segments

(3 and 4 excepted), rostrum, antennæ, and legs testaceous; densely clothed with small, narrow, piliform scales: the head with a line behind the eyes, the prothorax with the apical margin, a sinuous basal, and a transverse median, fascia (these markings connected at the sides and extending down the anterior part of the flanks), and the elytra with an interrupted sutural stripe, two oblique fasciæ radiating from it, the humeri, and apical margin, golden-yellow, the vestiture of the rest of the upper surface black or brown, that of the legs and under surface yellow or yellowish-white. Eyes very large, subcontiguous. Rostrum almost straight, rugulose and subcarinate at the base, smooth and shining thence to the apex. Prothorax strongly transverse, subconical, the sides slightly rounded, the base deeply bisinuate; densely, minutely punctate, feebly carinate, the posterior lobe rather convex on the disc. Elytra narrowing from about the middle, blunt at the apex; punctate-striate, the interstices convex, minutely punctate. Pygidium narrowly exposed. Mesosternum unimpressed. Legs rather stout, the posterior tibiæ slightly widened.

Length $5\frac{1}{2}$, breadth 3 millim. (♀?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen, somewhat immature. Easily recognizable by the transverse golden-yellow fasciæ on the prothorax and elytra, and the entirely pale legs, rostrum, and antennæ.

2. *Philenis fuscifemorata*, sp. n. (Tab. III. figg. 19, 19 a, b.)

Subovate, flattened above, black, the elytra reddish-brown, each with a large, subtriangular, black patch near the apex, the rostrum, antennæ, tibiæ, and tarsi, the anterior face and apex of each femur, the metasternum (except at the sides), and the first two ventral segments rufo-testaceous; thickly clothed with small, narrow, piliform scales: the head, the prothorax with a broad space on each side and another down the middle (leaving two sinuous black vittæ on the disc), and the elytra with the basal margin, a common, curved, interrupted fascia below the base (extending outwards to the fifth stria), a small spot in a line with it on the ninth interstice, and a broad curved fascia at about one-third from the apex, extending down the suture and sides to the tip (enclosing the large black patch), yellowish-white, the rest of the vestiture of the upper surface black, that of the under surface and legs yellowish-white, the dark portions of the femora excepted. Eyes large, narrowly separated. Rostrum arcuate, widened at the apex, rugulose and subcarinate at the base, opaque and almost smooth thence to the tip. Prothorax slightly broader than long, conical, the base obliquely cut off on each side; densely, minutely punctate, subcarinate. Elytra narrowing from about the middle, the apices broadly and bluntly rounded; punctate-striate, the interstices convex, minutely punctate. Mesosternum slightly depressed in the middle.

Length $4\frac{2}{3}$, breadth $2\frac{1}{3}$ millim. (♂?)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. This insect is less robust than *P. flavipes*; the eyes are smaller; the prothorax longer, conical, obliquely cut off on each side at the base, and nigro-bivittate on the disc; the basal fascia of the elytra is reduced in extent and not continued forwards along the suture to the base; and the femora are in great part black.

PÆCIOLOGASTER.

Pæcilogaster, Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 16 (1895).

Pæcilogaster includes a single very handsome Tropical-American species. In this genus the broad, deep mesosternal excavation is limited on each side by an oblique ridge, the open rostral canal extending into the declivous anterior portion of the metasternum; the prosternum is armed with a conical tubercle behind each anterior

coxa, and there is a similar tubercle on the coxa itself; and the knees are spined. The vestiture of *P. brevis* is dense, vermilion-red, paler beneath, the prothorax and elytra maculated with black.

1. **Pæcilogaster brevis.** (Tab. III. figg. 20, 20 *a*, *b*, var.)

Copturus brevis, Waterh. Cist. Ent. ii. p. 424¹.

Pæcilogaster brevis, Heller, Abhandl. Mus. Dresd. no. 11, p. 17².

Pæcilogaster longior, Heller, loc. cit. p. 16, tab. fig. 32 (antenna)⁴.

Hab. COSTA RICA (coll. Faust³, in *Mus. Dresd.*); PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).—COLOMBIA, Medellin^{1 2}.

A single beautifully fresh specimen of this species was captured by myself in Chiriqui. The types, both of which have the vestiture discoloured and partially abraded, certainly appertain to one species, the black markings varying in extent, both on the prothorax and the elytra. The eyes are more approximate in the Medellin insect than in the other two examples seen.

EUZURUS, gen. nov.

Antennæ rather stout, inserted at the basal third of the rostrum, joint 2 of the funiculus about twice as long as 1, 3-7 short, 6 and 7 transverse, the club ovate, 4-jointed, 1 shorter than the others united; eyes narrow, elliptic, acuminate below, separated by rather more than half their width; rostrum curved, widened at the base, not extending beyond the middle coxæ; prothorax transverse, deeply sinuate at the base, without ocular lobes, the basal lobe produced, rounded at the tip, filling the scutellar cavity; scutellum not visible; elytra much wider than the prothorax, rounded-triangular, flattened on the disc, blunt at the apex, sharply margined externally by the acute carina on the ninth interstice; mesosternum depressed, with two sharp parallel ridges extending on to the depressed intercoxal portion of the metasternum, the latter shallowly excavate between them, the rostral canal open behind; ventral segments abruptly ascending, 2 along the middle as long as 3-5 united, the first suture sinuate; legs rather stout; femora compressed, each with a long sharp tooth, carinate on both their inner and outer faces, the posterior pair not reaching beyond the apex of the abdomen; tibial claw stout; third tarsal joint broadly bilobed.

Type, *E. ornativentris*.

This genus agrees with *Zurus* in having the scutellum hidden by the basal lobe of the prothorax, but differs from it in the sternal structure—the rostral canal being open behind in *Euzurus*, and limited on each side of the mesosternum by a sharp longitudinal carina,—the narrow eyes, &c.

1. **Euzurus ornativentris**, sp. n. (Tab. III. figg. 21, 21 *a*, *b*.)

Subrhomboidal, broad, flattened above and very convex beneath, black, thickly clothed with minute scales: the head ochreous, fulvous behind the eyes, with a black v-shaped mark on the vertex; the prothorax with a broad patch on each side in front, extending down the flanks, rust-red, a narrow median vitta, a spot near each hind angle at the base, a faint oblique streak between this and the median stripe, and a line along the posterior edge of the red patch, ochreous or white, and two vittæ down the middle, and an oblique curved stripe on each side at the base (extending transversely down the flanks), black; the elytra with the basal half variegated with ochreous and black, the apical half with pale blue and fulvous scales intermixed; the abdomen white, two longitudinal stripes on segments 2-5, extending outwards along the anterior portion of 2, and the basal half of 1, black, 2 with a large rust-red patch on

each side; the vestiture of the legs sparse, whitish, lineate or variegate with fuscous. Head with a smooth line on the vertex; rostrum rugulose, tricarinate and quadrisulcate at the base, the apical half finely, rather closely punctate. Prothorax much broader than long, constricted in front, the sides rounded behind and obliquely converging anteriorly; densely, minutely punctate, the disc rather convex, carinate to near the apex, and also with a transverse carina on each side behind the red patch. Elytra finely seriate-punctate, the interstices 3, 5, 7, and 9 sharply and narrowly, and 2, 4, 6, and 8 more feebly (except towards the base), costate, the ridges on 3 and 7 confluent posteriorly, that on 9 very prominent and abruptly ending before the apex, the apices themselves thus appearing obliquely truncated.

Length $6\frac{1}{10}$, breadth $3\frac{2}{5}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen. A remarkable insect, resembling *Zygops rufomaculata* in the colour of the vestiture of the upper and under surfaces, but with the general facies of a *Eucopturus*.

MICROZYGOPS, gen. nov.

Antennæ inserted near the base of the rostrum, joint 2 of the funiculus elongate, fully one-half longer than 1, three times the length of 3, 3 and 4 subequal in length, 5-7 short, 7 transverse, the club ovate, with its first joint about as long as the others united; rostrum arcuate, thickened towards the base, extending to just beyond the intermediate coxæ, the tip received in a smooth deep cavity in the front of the metasternum; head somewhat exserted; eyes extremely large, contiguous in front, separated above by a rather broad lanciform space; prothorax obliquely articulated to the mesothorax, cylindrical, strongly constricted in front, bisinuate at the base, truncate at the apex, without ocular lobes, the basal lobe truncated; scutellum rounded; elytra rounded-subtriangular, much wider than, and about twice as long as, the prothorax; pygidium not visible; mesosternum very narrowly depressed at the base, the depression limited on each side by a compressed tuberculiform prominence; mesothoracic epimera narrow and ascending; ventral segments rapidly ascending, 2 nearly as long as 3 and 4 united; legs long and slender, the posterior pair greatly elongated; femora deeply excavate near the apex beneath and the apex itself thickened, the anterior and intermediate pairs with a small tooth, the posterior pair unarmed; third tarsal joint narrowly bilobed, the claws minute.

Type, *M. nigrofasciata*.

The very long, slender legs, unarmed posterior femora, exserted head, cylindrical constricted prothorax, large eyes, deeply excavate anterior portion of the metasternum, &c., readily distinguish this interesting genus, based upon a single species from Chiriqui.

1. *Microzygops nigrofasciata*, sp. n. (Tab. III. figg. 22, 22 a, b.)

Oblong, ferruginous, the head, the base of the rostrum, the anterior half of the prothorax (except at the sides in front), and a very broad median fascia on the elytra (which is widened towards the suture anteriorly), black; somewhat thickly set with small narrow fulvous scales, the elytra with a line of white scales along the anterior edge of the dark fascia, which is itself clothed with black scales; the lower portion of the flanks of the prothorax white, the meso- and metasternal side-pieces, and the ventral segments 1 and 5, also spotted with white; the vestiture of the legs fulvous, white at the base of the femora. Head rugulosely punctate, finely carinate on the vertex; eyes distant from the prothorax above; rostrum rugose and strongly carinate at the base, and sparsely, minutely punctate along the sides thence to the tip. Prothorax nearly as long as broad; rugulosely punctate. Elytra flattened on the disc, bluntly rounded at the apex, the humeri smooth and swollen; punctate-striate, the interstices convex.

Length 3, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen.

ARACHNOMORPHA, gen. nov.

Antennæ inserted near the base of the rostrum, joints 1 and 2 of the funiculus equal in length, 3-7 short, the club ovate, acuminate, with joint 1 as long as the others united; rostrum arcuate, widened at the base, about as long as the head and prothorax as seen in profile; eyes very large, occupying the whole of the front of the head, somewhat acuminate below, very narrowly separated, the intra-ocular space wider and lanciform above; prothorax transverse, feebly sinuate at the base, without ocular lobes; scutellum very small, tuberculiform; elytra short, heart-shaped, with rows of coarse punctures separated by sharp ridges; pygidium not visible; mesosternum broad, flattened, gradually declivous; ventral segments ascending, 2 shorter than 3 and 4 united; legs long, femora linear, unarmed, the posterior pair extending far beyond the apex of the elytra and equalling them in length, tibial claw short, third tarsal joint narrowly bilobed, tarsal claws very small.

Type, *A. circumlineata*.

Arachnomorpha includes an isolated form from Chiriqui. It is related to *Mnemyne*, Pasc.

1. *Arachnomorpha circumlineata*, sp. n. (Tab. III. figg. 23, 23 a, b.)

Ovate, shining, black, the antennæ in part ferruginous; the prothorax with a narrow stripe on each side, which is continued along the sternal side-pieces and across the second ventral segment, and a posteriorly widened median vitta, the elytra with a mesially interrupted sutural stripe, and the under surface (ventral segments 3-5 excepted), clothed with coarse, oval, white, opalescent scales, the base of the rostrum and the legs with small, narrow, hair-like, white scales. Rostrum sparsely, minutely punctate, carinate and rugulose at the base. Prothorax much broader than long, somewhat rounded at the sides, narrowed and feebly constricted in front; coarsely, closely punctate, smooth along the anterior margin. Elytra coarsely crenate-striate, the interstices sharply and equally costate throughout. Beneath rather coarsely punctate.

Length $2\frac{1}{2}$, breadth $1\frac{2}{5}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen. In this insect the marginal line of coarse white scales on the prothorax is continued right round the sides of the body beneath.

LISSODERES, gen. nov.

Antennæ inserted at a little beyond the middle of the rostrum, joint 2 of the funiculus shorter than 1, 3-7 short, the club ovate, with joint 1 about as long as the others united; rostrum very stout, curved, scarcely longer than the prothorax as seen in profile, explanate at the apex, the scrobes deep, rapidly descending, and also continued forwards; mandibles stout, bifid at the tip; eyes very large, occupying the whole of the anterior portion of the globose head, contiguous in front, narrowly separated above; prothorax subcylindrical, truncate in front, bisinuate at the base; scutellum rather large; elytra short, wider than the prothorax, broadly truncate at the apex; pygidium covered; anterior coxæ with a conical tubercle; mesosternum declivous, unimpressed, the meso-metasternal suture straight; mesothoracic epimera narrow; ventral segments ascending, 2 about as long as 3 and 4 united; legs rather slender, femora linear, shallowly sulcate beneath, unarmed, the posterior pair as long as or longer than the elytra, tibiae compressed, the claw long, tarsi long, their third joint narrowly bilobed; body oblong, in part glabrous above.

Type, *L. subnudus*.

The above characters are taken from a single species from Chiriqui. The cylindrical, sparsely punctulate prothorax, the truncate, crenate-striate elytra, the short, stout, apically widened rostrum, the linear, unarmed femora, and the almost glabrous, shining upper surface, give it a peculiar facies.

1. **Lissoderes subnudus**, sp. n. (Tab. III. figg. 24, 24 a, b.)

Black or piceous, shining; the prothorax with the base narrowly, the elytra with the anterior margin and an elongate streak at the base of the second interstice, the under surface, and legs, sparsely clothed with narrow, white, hair-like scales, the vestiture becoming denser on the lower part of the flanks of the prothorax and on the mesothoracic epimera. Head minutely punctate; rostrum in one specimen (♂?) closely punctate and feebly carinate, in the others (♀?) smoother and not carinate. Prothorax about as long as broad, slightly narrowing forwards, sparsely, finely punctate, except down the middle, or almost smooth. Elytra rounded-subquadrate, depressed along the suture anteriorly, the humeri smooth and somewhat swollen; deeply crenate-striate, the interstices flat, minutely punctate near the suture, the outer ones smooth and bare. Beneath finely, sparsely punctate.

Length $3\frac{1}{5}$ – $4\frac{1}{2}$, breadth $1\frac{1}{2}$ –2 millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Three specimens, varying in size, in the length of the legs, and in the sculpture of the rostrum and prothorax. The two smoother examples are probably females, and the larger one a male. The elytra have some very minute scales on the disc, in addition to the narrow white scales near the base and suture.

PARAMNEMYNE.

Paramnemyne, Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 10 (1895).

In this genus, which was based upon three South-American species and includes two others from our region, the rostral canal reaches the apex of the metasternum, the eyes are well-separated above, the second joint of the funiculus is elongate, the base of the prothorax and elytra is deeply sinuate, the prothorax itself is very short and furnished with broad ocular lobes, the alternate elytral interstices are sharply costate, &c.

1. **Paramnemyne decemcostata**, sp. n. (Tab. III. figg. 25, 25 a.)

Rhomboidal, piceous or rufo-piceous, the antennæ and tarsi ferruginous; sparsely clothed with small ochreous scales, which are condensed into three narrow vittæ on the prothorax and numerous small scattered patches on the elytra, the elytra each with a transverse blackish patch on the disc before the middle, extending from the first to the fourth stria, the femora fusco-annulate. Head densely punctate, hollowed between the eyes. Prothorax about twice as broad as long, narrowing from the base, constricted in front; rather coarsely, rugulosely punctate. Elytra subtriangular, convex, transversely depressed below the base; deeply punctate-striate, the punctures somewhat distantly placed and oblong in shape, 3, 5, 7, 8, and 9* sharply costate, the ridge on 8 interrupted below the base. Femora unidentate.

Length 4– $4\frac{1}{4}$, breadth $2\frac{1}{5}$ – $2\frac{1}{2}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Eight specimens. Near *P. arcana*, Heller (= *leseleuci*, Jekel, in litt.), from Cayenne, but smaller, the transverse black patch on the elytra less extended (not forming a common arcuate fascia) and placed nearer the base, the vestiture sparser, the legs less

* Counting from the suture, not from the first stria.

elongate. *P. melanoscelis*, Heller, from Colombia, the type of which has been communicated by M. Severin for comparison, is larger and differently marked, and wants the ridge on the eighth elytral interstice.

2. *Paramnemyne pulchella*, sp. n. (Tab. III. figg. 26, 26 a.)

Subovate, black, the antennæ obscure ferruginous, the vestiture close and rather coarse, above and beneath: the head and prothorax vermilion-red, the latter with an anchor-shaped patch on the disc and a space along the sides almost bare; the elytra each with a rather broad, oblique, arcuate fascia extending from the base of the second interstice to near the margin, a streak at the base of the sixth interstice, and two others on the disc towards the apex, rosy-red, the suture in part and a streak at the middle of the seventh interstice yellowish-white, the scutellum similarly coloured, the other portions black; the under surface and legs white. Head densely punctate, the intra-ocular space depressed down the middle and arenately dilated on each side towards the vertex; rostrum reaching the apex of the metasternum, rugulose and finely carinate at the base; joint 2 of the funiculus very elongate, 3 about as long as 4 and 5 united. Prothorax short, narrowing from the base, abruptly constricted in front; densely, rugulosely punctate. Elytra rounded-triangular, transversely depressed on the disc below the base; rather coarsely punctate-striate, the interstices 3, 5, 7, and 9, and also 2 from the middle to the apex, very sharply costate. Legs rather elongate, the posterior femora reaching beyond the apex of the abdomen; femora unidentate; posterior tibiæ dilated and compressed, somewhat rounded along their outer edge.

Length 5, breadth $2\frac{7}{8}$ millim.

Hab. GUATEMALA, Teleman in the Polochic Valley (*Champion*).

One specimen. This insect has longer legs than *P. decemcostata*, the posterior tibiæ are widened, the intra-ocular space is more dilated, the scales on the prothorax (except upon the partially denuded spaces) and head are vermilion-red, the elytra are differently marked, &c.

MNEMYNURUS.

Mnemynurus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 4, 54 (1895).

Several species of this genus, including the typical *M. caloderes*, occur within our limits. They are recognizable by their very elongate rostrum (which in the typical forms nearly reaches the first ventral suture), long legs, strongly spinose knees, &c., as well as by the bright rufous vestiture of the anterior portion of the prothorax*. The various forms may be separated thus:—

a. Rostrum reaching to about the middle of the first ventral segment.

a¹. Legs moderately slender: species larger.

a². Prothorax conical, with the disc convex and strongly carinate . . . *caloderes*, Heller.

b². Prothorax flattened on the disc, not or feebly carinate.

a³. The transverse white fascia of the prothorax coalescent with the short streak on the median lobe; the elytra not flavo-cinereo-lineate at the base.

* A species of an allied genus, *Balaninurus miniatus*, Heller [Abhandl. Mus. Dresd. no. 11, pp. 53, tab. fig. 39 (antenna)], has been recorded from "Mexico"; but there must be some mistake about the locality, the unique type in the Brussels Museum being labelled "Brésil."

- a*⁴. Prothorax rounded at the sides posteriorly *ignifer*, sp. n.
*b*⁴. Prothorax conical *phænicoderes*, sp. n.
*b*³. The transverse white fascia of the prothorax not reaching the short
 streak on the median lobe; the elytra flavo-cinereo-lineate at
 the base *erythroderes*, sp. n.
*b*¹. Legs very slender; prothorax and elytra shorter, the white fascia on
 the former straight, the dark fasciæ of the elytra extending downwards
 on to the ventral surface: species smaller *pæciloderes*, sp. n.
b. Rostrum not extending beyond the apex of the metasternum; prothorax
 and elytra much as in *M. pæciloderes*, the dark fasciæ of the elytra not
 extending downwards *longispinis*, sp. n.

1. **Mnemynurus caloderes.** (Tab. III. figg. 27, 27 *a*, ♂, var.)

Mnemynurus caloderes, Heller, Abhandl. Mus. Dresd. no. 11, p. 54, tab. fig. 20¹.

Hab. NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba (*Champion*).—SOUTH AMERICA, Ecuador (*Mus. Brit.*), Cayenne¹, Amazons.

Four specimens, the one from Chontales wanting the fiery-red scales on the vertex, and all differing from a S.-American type communicated by M. Severin of the Brussels Museum, in having the rostrum ferruginous, the anterior and intermediate femora and a very large humeral patch on the elytra rufo-testaceous or brown, the vestiture of the sides of the meso- and metasternum in great part ochreous, and the prothorax a little less gibbous on the disc posteriorly. There are similarly-coloured examples from Ecuador and the Amazons in the British Museum. The anterior and intermediate legs vary in colour.

2. **Mnemynurus ignifer**, sp. n. (Tab. III. fig. 28, ♂.)

Very like *M. caloderes*, but differing as follows:—The prothorax with the basal third (instead of a rhomboidal patch on the disc behind) black in the ♂, wholly rufescent in the ♀, the vestiture of the anterior half rufous; the elytra black at the base in the ♀; the legs in part ferruginous. The eyes more distant above, narrowly separated in front; the prothorax broader than long, more or less rounded at the sides posteriorly, this being especially noticeable in the ♀, the median carina faint, the disc less swollen posteriorly; the elytra less dilated at the sides below the base, the fifth interstice scarcely raised.

Length 6–7 $\frac{1}{4}$, breadth 3–4 millim. (♂ ♀.)

Hab. MEXICO, Mirador and Toxpam in Vera Cruz (*Sallé*).

Two specimens. This is the Mexican representative of the southern *M. caloderes*. It has the smooth, stout ridge on the vertex equally prominent (though the median carina of the prothorax is much less distinct); the eyes are less approximate above; and the prothorax is more transverse, and rounded at the sides posteriorly. The ventral segments 2–4 (as in *M. caloderes*) have two almost bare stripes down the middle, which extend outwards along the base of 2; the apex of the fifth segment is truncate in the middle in the male, and rounded in the female.

3. *Mnemynurus phœnicoderes*, sp. n. (Tab. III. fig. 29.)

Rhomboidal, piceous or reddish-brown, the legs sometimes ferruginous, the antennæ testaceous, the vestiture fine above: the head white between and behind the eyes, fulvous or red on the vertex; the prothorax with a narrow, sharply-defined, sinuous, white fascia behind the middle, which extends narrowly down the centre of the median lobe to the base and is continued around the flanks beneath, the base itself also bordered with white towards the sides, the anterior half carmine-red; the elytra brownish or cinereous, the narrow cinereous scales here and there clustered into patches on the basal half of the disc and along the sides; the scales on the under surface white, ochreous at the sides of the metasternum, the ventral segments 2-4 with two almost bare stripes, which extend outwards along the base of 2, 1 also bare at the sides in front; the legs cinereous or whitish, the femora fulvous at the base above. Head densely punctate, except along the smooth raised median space on the vertex, the eyes well-separated above; rostrum nearly reaching the first ventral suture, rugulose and carinate at the base, and smooth thence to the tip. Prothorax conical, about as long as broad, flattened on the disc; densely, rather coarsely punctate, except along the smooth median line. Elytra somewhat cordate, blunt at the apex, depressed along the suture; punctate-striate, the interstices rugulose, the inner ones flat, the outer ones convex. Legs elongate; femora each with a small sharp tooth, the knees sharply dentate.

Length $5\frac{1}{4}$ - $6\frac{1}{2}$, breadth $2\frac{1}{8}$ - $2\frac{7}{8}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Five specimens. Smaller than *M. caloderes*; the prothorax with a narrower, more sharply-defined, white, post-median fascia, extending narrowly down the median lobe to the base, the disc less convex, and the median carina almost obsolete; the eyes less approximate above; the fifth elytral interstice not prominent. The conical prothorax, &c., separate *M. phœnicoderes* from *M. ignifer*.

4. *Mnemynurus erythroderes*, sp. n. (Tab. III. fig. 30.)

Rhomboidal, black, the anterior half of the prothorax rufo-piceous, the antennal club and the tip of the rostrum rufescent, the vestiture fine above: the head whitish between and behind the eyes, fulvous on the vertex; the prothorax with a short streak down the middle behind, a sharply-defined, transverse, interiorly narrowed, post-median fascia on each side of it, extending around the flanks beneath, and a space along the base, yellowish-white, the anterior half rust-red; the elytra brownish, mottled with flavo-cinereous, the flavo-cinereous scales condensed into interrupted lines or spots on the alternate interstices at the base; the scales on the under surface white, the ventral segments 2-4 with two almost bare stripes, which extend outwards along the base of 2, 1 bare at the sides in front, the metathoracic episterna with the anterior portion also bare. Head densely punctate, except along the smooth raised median space on the vertex, the eyes rather narrowly separated above; rostrum nearly reaching the first ventral suture, rugulose and carinate at the base, and smooth thence to the apex. Prothorax broader than long, conical, slightly rounded at the sides posteriorly, somewhat flattened on the disc; densely, finely punctate, and obsoletely carinate. Elytra subcordate, blunt at the apex, depressed along the suture; punctate-striate, the interstices 5, 7, and 9 convex. Legs elongate; femora each with a narrow sharp tooth, the knees sharply dentate.

Length 5 - $5\frac{1}{2}$, breadth $2\frac{2}{3}$ - 3 millim.

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. Very like *M. phœnicoderes*, but with the prothorax more finely punctate, the whitish transverse fascia narrowing inwards and not reaching the short median basal vitta, the vestiture of the anterior half rust-red; the elytra with the alternate interstices interruptedly lineate at the base, 5, 7, and 9 raised; the under surface with several bare dark spaces along the sides.

5. *Mnemynurus pæciloderes*, sp. n. (Tab. IV. figg. 1, 1 a.)

Elliptic, nigro-piceous, the head and the front of the prothorax rufo-piceous, the antennæ, rostrum, femora, and tibiæ ferruginous; the vestiture rather coarse: the head between and behind the eyes white, carmine-red on each side of the bare space on the vertex; the prothorax with three transverse marks at the base, and a narrow, straight, transverse fascia in front of this, connected along the middle with the central basal spot, white, the anterior half carmine-red; the elytra with two irregular, undulate, transverse fasciæ (which become straighter and sharply defined on the flanks), the base, and an interrupted sutural stripe, white, the other portions of the surface with a few minute brownish scales; the under surface white, except on the four transverse almost bare spaces at the sides. Head closely punctate, the vertex not carinate, the eyes almost contiguous in front and narrowly separated above; rostrum longer than the elytra, nearly reaching the first ventral suture, carinate and rugulose punctate at the base. Prothorax much broader than long, obliquely narrowing from near the base, constricted in front; densely, finely punctate. Elytra short, subcordate, blunt at the apex, depressed along the suture anteriorly; rather finely punctate-striate, the interstices rugulose and almost flat. First ventral segment with a shallow groove. Anterior coxæ with the inner portion dentiform. Legs very long and slender; femora each with a small, narrow tooth, the knees sharply dentate.

Length $3\frac{1}{2}$, breadth $1\frac{3}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen. This species is smaller than its allies, and has the prothorax and elytra shorter, and the legs much more slender; the white fascia on the prothorax is straight and the white scales on the elytra are condensed into undulate fasciæ.

6. *Mnemynurus longispinis*, sp. n. (Tab. IV. figg. 2, 2 a.)

Elliptic, short, black, the legs, rostrum, and antennæ rufo-testaceous; above thickly clothed with narrow scales: the anterior half of the prothorax and a line behind the eyes above rust-red, the rest of the surface white, with the exception of a faint transverse patch near the shoulder, a larger patch on the outer part of the disc near the apex, and a transverse median fascia, which are more or less fuscous; the under surface closely set with coarser, oval, pure white scales, the legs with white, hair-like scales. Head closely punctate, the vertex not carinate, the eyes very narrowly separated; rostrum nearly reaching the apex of the metasternum, rugulose and carinate at the base. Prothorax much broader than long, narrowing from near the base, feebly constricted in front; densely, finely punctate. Elytra subcordate, blunt at the apex, depressed along the suture anteriorly; punctate-striate, the interstices rugulose, flat. Legs elongate, the posterior femora not longer than the elytra, the intermediate and posterior pairs each with a small narrow tooth, the knees very sharply dentate.

Length $3\frac{1}{2}$, breadth 2 millim. (♀?)

Hab. PANAMA, Bugaba (*Champion*).

Two specimens, one with the darker, partially denuded, elytral markings more distinct than in the other. Very like *M. pæciloderes*, but with the rostrum not extending beyond the apex of the metasternum, the legs a little less elongate, the knees still more sharply dentate, the dark fasciæ of the elytra less developed and not extending downwards on to the ventral surface. The anterior femora are obsoletely dentate or unarmed beneath. The rostrum is only a little longer than in *Hoplocopturus javeti* and *H. nigripes*.

HOPLOCOPTURUS.

Hoplocopturus, Heller, Abhandl. Mus. Dresden, no. 11, pp. 4, 50, tab. fig. 4 (1895).

Under this genus, the type of which is *Copturus armatus*, Boh., are placed various species agreeing in the following characters * :—

Mesosternum (as in *Mnemynurus*) flattened, declivous, with a shallow transverse depression limited anteriorly by an arcuate ridge (reduced to two short carinæ in *H. costatipennis*). Metasternum flattened (*H. leptopus*, &c.), hollowed, or foveate between the middle coxæ (*H. elegans*). Rostrum not reaching beyond the middle of the metasternum. Joint 2 of the funiculus elongate. Posterior femora extending beyond the apex of the abdomen (shorter in *H. elegans* and *H. densus*), carinate or not externally, the inner apical lamella spiniform or acutely produced.

Hoplocopturus is connected with *Mnemynurus* by intermediate forms, and it can only be separated therefrom by the shorter rostrum. The arcuate ridge on the mesosternum distinguishes it from *Copturus*. The Central-American forms may be grouped thus:—

- a. Rostrum reaching the middle of the metasternum ; femora unidentate . . . Species 1, 2.
- b. Rostrum not (except in *H. leptopus*, ♀) reaching the middle of the metasternum.
 - a'. Femora bidentate ; metasternum hollowed between the middle coxæ . . . Species 3-6.
 - b'. Femora unidentate.
 - a². Head rather broad, with very large eyes : body oblong-rhomboidal or elliptic.
 - a³. Metasternum hollowed between the middle coxæ.
 - a⁴. Elytra costate ; the arcuate mesosternal carina reduced to two short ridges Species 7.
 - b⁴. Elytra not costate ; the arcuate mesosternal carina complete . . . Species 8, 9.
 - b³. Metasternum foveate between the middle coxæ : species very small . . . Species 10-13.
 - b². Head smaller, the eyes not so large ; metasternum hollowed or flattened between the middle coxæ : body subrhomboidal Species 14, 15.

1. *Hoplocopturus javeti*, sp. n. (Tab. IV. figg. 3, 3 a.)

Copturus javeti, Jekel, in litt.

Oblong-rhomboidal, shining, piceous or rufo-piceous, the prothorax sometimes rufous, the antennæ ferruginous ; the vestiture sparse, fine on the elytra, coarser on the prothorax, ochreous or yellowish-white, condensed into a line around the eyes, a line along the anterior margin of the prothorax, and a sinuous fascia towards its base, the latter extending down the median lobe, the elytra with various interrupted denser yellowish lines on the basal half and a narrow whitish sutural stripe ; the under surface, a broad bare space along the middle of the abdomen excepted, thickly clothed with coarse, oval, whitish scales, the vestiture of the legs also white. Eyes very large, narrowly separated. Rostrum reaching to about the middle of the metasternum, rugulose and sharply carinate at the base. Joint 2 of the funiculus elongate, rather longer than 3 and 4 united, the latter subequal in length, each as long as 1, 5-7 short. Prothorax somewhat convex, subconical, a little broader than long, with rounded ocular lobes ; closely, coarsely punctate, the punctures transverse and here and there confluent, a narrow space at the base densely, finely punctate, the disc subcarinate. Scutellum small, tuberculiform. Elytra rapidly

* *Copturus furfuraceus* (Germ.) is included in *Hoplocopturus* by Heller, but it wants the transverse depression at the base of the mesosternum.

narrowing from a little below the base, the obliquely truncated humeri almost in a line with the sides of the prothorax, the basal margin sharply raised; deeply punctate-striate, the interstices punctulate and almost flat. Mesosternum subvertical, with a narrow transverse depression between the coxæ limited in front by an arcuate ridge. Metasternum shallowly depressed down the middle. Legs very long, slender; femora unidentate, the anterior pair sometimes unarmed, the intermediate and posterior pairs carinate externally; knees with a sharp spine.

Length $5-7\frac{1}{10}$, breadth $2\frac{1}{3}-3\frac{2}{5}$ millim. (♂ ♀.)

Hab. GUATEMALA, Las Mercedes, Pantaleon, Zapote, Teleman (*Champion*).—SOUTH AMERICA, Cayenne, Amazons (*Mus. Brit.*).

Six specimens from Guatemala, two from Cayenne, and one from the Amazons. This species is very like a *Mnemynurus*, but it has a shorter rostrum.

2. *Hoplocopturus nigripes*, sp. n. (Tab. IV. figg. 4, 4 a, b.)

Subovate, black, the antennæ ferruginous; above thickly clothed with narrow scales: the anterior half of the prothorax and a line behind the eyes carmine-red, the space between them white, the prothorax with a narrow fascia near the base, extending down the median lobe, and the elytra with the base, two undulate fasciæ, and an oblong patch on the suture at the apex, also white, the rest of the upper surface blackish, the two blackish elytral fasciæ extending downwards on to the side-pieces of the metasternum; the under surface closely set with coarser, oval, white scales, the legs with piliform, white scales. Head broad, closely punctate, the eyes separated by a narrow space; rostrum reaching the middle of the metasternum, rugulose and carinate at the base. Prothorax nearly twice as broad as long, obliquely narrowing from the base, the anterior constriction indistinct; densely punctate. Elytra short, rounded-triangular, blunt at the apex; punctate-striate, the interstices rugulose, flat. First ventral segment broadly depressed down the middle in the ♂. Legs moderately long, the posterior femora extending beyond the apex of the abdomen; anterior and intermediate femora obsolete, the posterior femora distinctly, unidentate; anterior knees feebly, the others sharply, dentate.

Length 3, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. This insect resembles *Mnemynurus longispinis*, but it has the rostrum and legs shorter and blacker, the eyes less approximate, the prothorax shorter, the elytra with sharply-defined, complete, light and dark fasciæ, the latter extending downwards on to the sides of the metasternum. The head is much broader than in *H. leptopus*, *H. varipes*, and *H. armatus*.

3. *Hoplocopturus quinquevittatus*, sp. n. (Tab. IV. figg. 5, 5 a; 5 b, mesosternum.)

Elliptic, flattened above, shining, black, the antennæ ferruginous; the head with a line around eyes, the prothorax with five narrow vittæ (the outer ones scarcely visible from above), and the elytra with the basal margin, the suture, two undulate transverse fasciæ on the disc, and a narrow streak at the apex of the seventh interstee, yellowish-white, the rest of the vestiture of the upper surface sparse and blackish; the under surface and legs with yellowish-white scales, the ventral segments 1-4 with a broad space down the middle, 1 and 2 also with a space at the sides, and 5 entirely, infusate or bare. Eyes extremely large, very narrowly separated. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus as long as 3-7 united. Prothorax much broader than long, narrowing from the base, feebly constricted in front; closely, rather coarsely punctate, the punctures on the middle of the disc transverse. Elytra oblong-cordate; deeply punctate-striate, the interstices almost flat, rather sparsely, minutely punctate. Meso- and metasternum depressed between the middle coxæ, the mesosternal depression limited

anteriorly by an arcuate ridge. Legs rather elongate, femora bidentate beneath (the outer tooth small), the posterior pair carinate externally and extending beyond the apex of the elytra, the intermediate and posterior knees spinose.

Length $6\frac{1}{2}$, breadth 3 millim.

Hab. NICARAGUA, Chontales (*Belt*).

One specimen. Very like *Copturus quadricinctus*, but a little more elongate, and with longer legs, the prothorax 5-vittate, the elytra deeply striate, the interstices not costate, the abdomen with a broad almost bare space down the middle, the femora bidentate, the posterior knees with two sharp spines, the mesosternum with a transverse, semicircular depression.

4. *Hoplocopturus nubilus*, sp. n. (Tab. IV. fig. 6.)

Subelliptic, moderately long, brown, the antennæ ferruginous; rather sparsely clothed with narrow scales: the head with a line around the eyes, and the prothorax with an oblique vitta on each side and a less distinct median stripe, ochreous, the elytra with a quadrate patch at about the middle of the suture, the suture narrowly at the apex, and numerous indefinite spots or markings, ochreous, the rest of their vestiture reddish-brown; the under surface with oval and narrow ochreous scales, the vestiture of the legs similarly coloured, the posterior femora with a broad dark annulus beyond the middle. Eyes very large, narrowly separated. Rostrum carinate and rugulosely punctate at the base. Joint 2 of the funiculus elongate, about as long as 3-6 united, 3 and 4 equal in length, 5-7 short. Prothorax broader than long, narrowing from near the base, feebly constricted in front; densely, rugulosely punctate, and obsoletely carinate. Elytra much wider than the prothorax, moderately long, gradually narrowing from near the base, the sutural region depressed; punctate-striate, the interstices rugulose and (except near the suture) convex. Meso- and metasternum hollowed between the middle coxæ, the mesosternal depression limited in front by an arcuate ridge, the other depression foveiform. Legs moderately long; femora each with a sharp triangular tooth and a minute tooth exterior to it, the posterior pair carinate externally and reaching to a little beyond the apex of the abdomen; intermediate and posterior knees each with a sharp spine.

Length $6\frac{1}{2}$, breadth $3\frac{1}{10}$ millim.

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*).

One specimen. Near *H. sulphureus*, but larger and longer, the prothorax less transverse and with a sharply-defined oblique vitta on each side, the elytra with numerous indefinite markings and a quadrate sutural patch, their outer interstices convex, the metasternal depression foveiform*.

5. *Hoplocopturus sulphureus*, sp. n. (Tab. IV. fig. 7.)

Subelliptic, opaque, piceous, the antennæ and rostrum rufescent; the vestiture close and fine: the head with a line around the eyes, the prothorax with the sides broadly, and the elytra with a transverse mark on the suture beyond the middle, another at the sides beyond this, the suture itself at the apex, and some other faint scattered markings, sulphur-yellow, the rest of the upper surface brown, the under surface uniformly sulphur-yellow, the legs flavo-cinereous, the intermediate and posterior femora with an almost bare dark annulus towards the apex. Eyes very large, subcontiguous. Rostrum carinate and rugulosely punctate at the base. Joint 2 of the funiculus very elongate, about as long as 3-6 united, 3 as long as 1, 4 slightly longer than 3, 5-7 short. Prothorax short, narrowing from the base; densely, finely punctate

* We have another allied form from Chontales, but as the head is now missing the species cannot be described.

and obsoletely carinate. Elytra punctate-striate, the interstices densely rugulose and almost flat. Meso- and metasternum slightly hollowed between the middle coxæ, the mesosternal depression limited anteriorly by an arcuate ridge. Legs long and slender; femora bidentate, the outer tooth very minute, the posterior pair without external carina; intermediate and posterior knees each with a sharp spine.

Length $5\frac{1}{5}$, breadth $2\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. The vestiture of this insect is coloured very much as in *Piazurus sulphuriventris*, except that the narrow yellow scales are not condensed above into sharply-defined spots on both the prothorax and elytra. *H. sulphureus* approaches *H. spinipes*.

6. *Hoplocopturus spinipes*, sp. n. (Tab. IV. fig. 8.)

Subelliptic, dull, nigro-piceous, the rostrum rufescent, the antennæ ferruginous; the vestiture close and fine: the head with a line around the eyes, and the prothorax with three vittæ, cinereous; the elytra blackish, with the suture, two undulate, interrupted fasciæ (one broad, basal, enclosing the smooth humeral callus, the other, narrower, a little beyond the middle), and several small spots, cinereous; the under surface with whitish, the legs with narrow cinereous, scales. Eyes very large, narrowly separated. Rostrum carinate and closely punctate at the base. Joint 2 of the funiculus elongate, nearly as long as 3-6 united, 3 and 4 subequal, each about as long as 1, 5-7 short. Prothorax transverse, narrowing from the base; densely punctate. Elytra deeply punctate-striate, the interstices rugulose and almost flat. Meso- and metasternum hollowed between the middle coxæ, the mesosternal depression limited anteriorly by an arcuate ridge. Legs moderately long, rather slender; femora bidentate, the minute outer tooth distant from the other, the posterior pair without external carina; intermediate and posterior knees each armed with a very long, and the anterior knees with a shorter, spine.

Length $4\frac{1}{2}$, breadth $2\frac{1}{3}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Small, shorter, and duller than *H. quinquevittatus*, the vestiture not so coarse, the markings more extended and not so sharply defined, the prothorax more finely punctate, the elytral interstices densely rugulose, the legs shorter.

7. *Hoplocopturus costatipennis*, sp. n. (Tab. IV. figg. 9; 9 α , mesosternum.)

Subrhomboidal, broad, shining, piceous, the antennæ ferruginous; mottled above with a sparse clothing of whitish, fulvous, and brown scales, the white scales condensed into a small subcruciform patch at the middle of the suture; the vestiture of the under surface coarse and whitish. Head with a smooth shining space down the middle of the vertex; eyes very large, narrowly separated; rostrum rather stout, rugulose punctate and carinate at the base; joint 2 of the funiculus about as long as 3-6 united, 3 and 4 subequal in length, 5-7 short. Prothorax broader than long, rather convex, narrowing from the base, strongly constricted in front; coarsely, closely punctate and incompletely carinate. Elytra short, much wider than the prothorax, subcordate; coarsely punctate-striate, the interstices 3, 5, 7, and 9 very sharply, and 4 feebly, costate. Meso- and metasternum depressed between the middle coxæ, the shallow transverse mesosternal depression limited on each side by a short oblique ridge. Legs moderately long; femora unidentate, the posterior pair reaching to a little beyond the apex of the elytra, the intermediate and posterior pairs carinate externally and each armed with a narrow spine at their apex.

Length 6, breadth $3\frac{2}{5}$ millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One worn specimen. Recognizable by the broad, short, subcordate, sharply costate

elytra, with a small cruciform white patch at the middle of the suture, and the coarsely punctate, rather convex prothorax. *H. costatipennis* has somewhat the facies of *Copturus martae*, but the elytra are costate and much shorter, the mesosternum is transversely depressed, &c.

8. *Hoplocopturus ochreicollis*, sp. n. (Tab. IV. fig. 10.)

Subrhomboidal, flattened above, black, the antennæ, the tips of the tarsi, and sometimes the femora and tibiæ in part, ferruginous, the basal half of the elytra (except at the sides) and the apical half of the rostrum reddish; above rather sparsely clothed with narrow scales: the head with a narrow line around the eyes, and the prothorax with the sides broadly and a broad median vitta, ochreous; the elytra with a twice interrupted sutural stripe, two transverse fasciæ at the sides, and various interrupted, undulate fasciæ crossing the disc, white, the intervening spaces black or blackish, the white scales often becoming almost wholly ochreous on the anterior half of the disc; the under surface thickly clothed with larger white scales, the fifth ventral segment with a dark patch in the centre, the vestiture of the legs also white, the posterior femora with an oblique black band beyond the middle. Eyes very large, subcontiguous. Rostrum rugulose punctate and carinate at the base. Joint 2 of the funiculus as long as the next four or five joints united, 5-7 very short or transverse. Prothorax short, narrowing from the base, densely, rugosely punctate. Elytra rather short, rounded-triangular; deeply punctate-striate, the interstices rugulose and almost flat. Meso- and metasternum depressed between the middle coxæ, the mesosternal depression limited in front by an arcuate ridge. Femora sharply unidentate, the posterior pair about reaching the apex of the abdomen, the knees with a long spine.

Length $3\frac{1}{4}$ - $4\frac{1}{2}$, breadth $1\frac{1}{5}$ - $2\frac{1}{2}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Eleven specimens, varying in size, in the colour of the vestiture of the basal half of the elytra (the scales sometimes white and sometimes ochreous), and in the length of the spine at the apex of the femur, this being short on the anterior pair in the smallest example. The elytra are black at the sides and apex, and have two dark patches on the suture, interrupting the sutural stripe. The differently marked elytra and the obliquely banded posterior femora separate *H. ochreicollis* from *H. basalis*.

9. *Hoplocopturus basalis*, sp. n. (Tab. IV. fig. 11.)

Subelliptic, rather robust, black, the antennæ and tarsi, and the basal half of the elytra, reddish or ferruginous; rather sparsely clothed with narrow scales: the prothorax with three broad, faint, ochreous vittæ, the elytra with the basal half ochreous and the apical half blackish, the apical two-thirds of the suture, a short transverse band at the sides a little beyond the middle, and a narrow streak on the interstices 3 and 5 towards the apex, white; the vestiture of the legs and under surface also white. Eyes very large, almost contiguous. Rostrum rugulose and sharply carinate at the base. Joint 2 of the funiculus as long as 3-5 united, 4 twice as long as 3 and of the same length as 1, 5-7 very short. Prothorax short, constricted and narrowed in front; closely, rather coarsely punctate. Elytra flattened, rounded-triangular, the apices separately rounded at the sutural angle; deeply striate, the striæ finely punctate, the interstices densely rugulose and almost flat. Meso- and metasternum depressed between the middle coxæ, the mesosternal depression limited in front by an arcuate ridge. Legs moderately long; femora sharply unidentate, the intermediate and posterior pairs carinate externally, the latter reaching a little beyond the apex of the abdomen; intermediate knees with a short, the posterior knees with a long, spine.

Length $3\frac{1}{2}$, breadth $1\frac{9}{10}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

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II

One specimen. This insect has the basal half of the elytra reddish and clothed with ochreous scales, and the apical half blackish, ornamented on the disc with short white lines.

10. *Hoplocopturus elegans*, sp. n. (Tab. IV. fig. 12.)

Subelliptic, nigro-piceous, the elytra rufescent, their apical margin, the antennæ, the tip of the rostrum, and the legs in part, rufescent; the vestiture moderately close: the head with a line around the eyes, and sometimes the base of the rostrum also, carmine-red; the prothorax with three white patches at the base, the anterior third or half carmine-red; the elytra sometimes with a darker fascia immediately below the base extending outwards to the bare humeral callus, the suture, or a short streak at its base, white, the striae with a single and the interstices with two or more rows of pale ochreous hair-like scales; the under surface thickly clothed with coarse whitish scales, the vestiture of the legs also white. Eyes almost contiguous in front, narrowly separated above. Rostrum rugulose punctate and carinate at the base. Joint 2 of the funiculus moderately elongate, as long as 3 and 4 united. Prothorax short, gradually narrowed and feebly constricted in front; densely, rugulose punctate, and faintly carinate. Elytra deeply punctate-striate, the interstices narrow and feebly convex. Meso- and metasternum excavate between the middle coxæ, the mesosternal depression limited anteriorly by an arcuate ridge, the metasternal depression smooth and foveiform. Legs slender; femora each with an acute tooth, the posterior pair without external carina, their apices acute or spiniform.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{1}{4}$ millim. (♂ ♀.)

Hab. GUATEMALA, Cerro Zunil (*Champion*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Five specimens from Guatemala and seven from Chiriqui. This and the following three forms are very closely related, but it is impossible to treat them as one species. The foveate metasternum separates them from their allies. The spine at the apex of the posterior femora varies in length.

11. *Hoplocopturus scintillans*, sp. n. (Tab. IV. fig. 13, ♀.)

Very like *H. elegans*, but with three large metallic-blue patches at the base of the prothorax (instead of three clusters of narrow whitish scales); the eyes somewhat widely separated above in the ♂, subcontiguous in the ♀; joint 2 of the funiculus as long as 3–5 united.

Length $2\frac{1}{8}$ –3, breadth $1\frac{1}{5}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Five specimens. The blue patches on the prothorax of this insect, as in *Copturus lamprothorax*, are due to reflected light, and not to definite scales.

12. *Hoplocopturus mariæ*, sp. n. (Tab. IV. fig. 14, ♂.)

More robust than *H. elegans*; the head with a rust-red line around the eyes; the prothorax with three triangular spots at the base and a line along the upper part of the flanks clothed with oblong-oval, bluish-white scales, the anterior half with narrow rust-red scales, with a few white ones intermixed; the elytra with a transverse darker fascia immediately below the base and an oblong white spot on the suture behind the scutellum, the rest of the vestiture ochreous or whitish; the ventral segments 3–5 with the sides and a space down the middle almost bare. Eyes somewhat widely separated above. Joint 2 of the funiculus as long as 3–5 united. Prothorax rather coarsely punctate.

Length $2\frac{9}{10}$, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. GUATEMALA, Rio Maria Linda, Pacific slope (*Champion*).

One specimen.

13. *Hoplocopturus densus*, sp. n. (Tab. IV. fig. 15.)

Very like *H. elegans*, but with the vestiture denser above, especially on the elytra: the line around the eyes and the anterior half of the prothorax rust-red, the three large patches at the base of the latter white; the elytra with an interrupted angulate dark fascia just below the base, the suture with a short whitish streak behind the scutellum, the interstices each with three or more rows (two rows only on the disc in *H. elegans*) of pallid hair-like scales; the whitish scales on the under surface narrower; the elytral interstices flat, broader than the striae; the spines at the apex of the femora sharp.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. GUATEMALA, Cerro Zunil (*Champion*).

One specimen. Perhaps an extreme form of *H. elegans*?

14. *Hoplocopturus leptopus*. (Tab. IV. fig. 16.)

Hoplocopturus leptopus, Heller, Abhandl. Mus. Dresd. no. 11, p. 51, tab. fig. 28¹.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*), Teapa (*H. H. Smith*), Orizaba¹, Oaxaca¹; GUATEMALA (*Sallé*), San Juan, Panima, and Chacoj in Vera Paz (*Champion*); COSTA RICA, Surubres near San Mateo, 250 metres, Pacific slope (*Biolley*).

Numerous specimens, varying a good deal in size and colour, the legs often entirely rufo-testaceous. The head is rather small, as in *H. armatus* (Boh.) and *H. varipes*. The rostrum of the female sometimes reaches the middle of the metasternum. The white scales on the elytra are condensed into two undulate fasciae and a narrow sutural stripe, the latter being wanting in the allied *H. varipes*. The length varies from $2\frac{1}{2}$ –4 millim.

15. *Hoplocopturus varipes*, sp. n. (Tab. IV. fig. 17.)

Subrhomboidal, shining, nigro-piceous or black, the tip of the rostrum, the antennae, the anterior and intermediate legs, and the posterior tarsi (and in one specimen the posterior tibiae also), rufo-testaceous or ferruginous; thickly clothed above with piliform scales: the head and prothorax fulvous (or whitish); the latter with two darker patches on the disc and a transverse white line running outwards from each of them (these lines extending forwards on the flanks), the elytra mottled with fulvous, white, and black, the fulvous scales showing a tendency to form undulate fasciae, the white scales condensed into a small spot at the middle of the second interstice and another on the eighth towards the apex; the under surface with coarser white scales, the vestiture of the legs sparse, white. Head comparatively small, with a smooth space on the middle of the vertex, the eyes narrow; rostrum rugulosely punctate and sharply carinate at the base; joint 2 of the funiculus elongate, twice as long as 3, 3 slightly longer than 1, the others very short. Prothorax short, rapidly narrowing from the base, constricted in front; densely, rugulosely punctate, and carinate. Elytra broad, rounded-triangular; deeply punctate-striate, the interstices punctulate and almost flat. Metasternum broadly flattened between the middle coxae, the mesosternum with a narrow transverse depression. Legs moderately long, slender; femora feebly unidentate, the posterior pair with a faint external carina, their knees with a sharp spine.

Length $4\frac{1}{2}$ – $4\frac{4}{5}$, breadth $2\frac{1}{2}$ –3 millim.

Hab. COSTA RICA, Caché and Irazu (*Rogers*).—ECUADOR, Paramba (*coll. Fry*).

Two specimens from Costa Rica and four from Ecuador, one only in good condition. Larger than *H. leptopus*, the white markings on the prothorax reduced to a narrow transverse line and those on the elytra to a few small spots.

COPTUROMIMUS.

Copturomimus, Heller, Abhandl. Mus. Dresd. no. 11, p. 63 (1895).

Dr. Heller referred two species to this genus, which is easily separable from *Copturus* by the bare, impunctate, obliquely strigose area on the anterior femora, a character not mentioned in his diagnosis. Various other forms are now added, agreeing in the following characters :—

Joint 2 of the funiculus elongate, much longer than 1; meso- and metasternum flattened or transversely depressed between the middle coxæ, the mesosternum without oblique ridges, the metasternal depression sometimes foveiform; femora unidentate beneath, the posterior pair carinate or not externally, sometimes (*C. ochreonotatus*) reaching a little beyond the apex of the abdomen, the anterior pair with a conspicuous obliquely strigose area on their front face.

Copturomimus as thus defined includes most of the Central-American forms with a coarsely or finely strigose area on the anterior femora, the others being here placed under *Copturomorpha*. This peculiar sculpture of a portion of the surface of the anterior femora has been noticed by Kirsch in *Copturus musicus**, and he suggests that it may be a stridulating-organ. It seems more likely, however, to judge from the position of the antennæ in various unset specimens before me, that it is used for cleaning the sensitive portions of the antennal club. *C. cæruleotinctus* has long, fine, projecting hairs on the anterior tarsi of the male.

Meso- and metasternum flattened between the middle coxæ.

Posterior femora reaching beyond the apex of the abdomen; all the tibiæ more or less dilated Species 1.

Posterior femora not reaching beyond the apex of the abdomen; the tibiæ not or feebly dilated.

Elytra with the alternate interstices costate Species 2, 3.

Elytra with flattened elytral interstices Species 4–8.

Meso- and metasternum depressed between the middle coxæ† Species 9, 10.

1. *Copturomimus ochreonotatus*, sp. n. (Tab. IV. figg. 18, 18 a.)

Subovate, black, the tarsi ferruginous; the prothorax with narrow, ochreous and fulvous scales scattered along the sides and middle, and with three small patches of coarser scales at the base; the elytra with a broad, dense, transverse patch at the base (extending outwards to the sixth stria), a small spot at the middle of the second interstice, a larger one on the seventh and eighth interstices at about one-third from the apex, and a short streak on the suture near the tip, ochreous, the rest of their vestiture close and almost entirely blackish-brown; the under surface and the basal half of the femora with scattered white scales,

* Berl. ent. Zeitschr. 1875, p. 248.

† The Colombian *C. ochrofasciatus*, Heller, belongs to this section.

the apices of the femora and the tibiae with narrow fuscous scales. Eyes very large, subcontiguous. Rostrum reaching to a little beyond the middle coxae, closely punctate and carinate at the base. Joints 2-4 of the funiculus elongate, 2 nearly one-half longer than 3. Prothorax strongly transverse, slightly rounded at the sides, narrowed and constricted in front; densely punctate and subcarinate. Elytra broad, much wider than the prothorax, blunt at the tip, transversely depressed at the base; with rows of rather coarse oval punctures placed in shallow striae, the interstices flat and rugulose. Meso- and metasternum broad and flattened between the intermediate coxae. Legs rather long; femora feebly unidentate beneath, the posterior pair reaching beyond the apex of the abdomen and without distinct carina on their outer face, the area on the anterior pair large and very finely strigose; tibiae widened and compressed, the posterior pair broad and somewhat rounded along their inner and outer edges; tarsi long and slender.

Length $6\frac{3}{4}$, breadth 3 millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Recognized by the large, common, dense, transverse, ochreous patch at the base of the elytra, the rather elongate hind legs, with dilated tibiae, and the very finely strigose area of the anterior femora.

2. *Copturomimus rufocinctus*, sp. n. (Tab. IV. figg. 19; 19 *a*, ant. femur.)

Subovate, black, the anterior portion of the prothorax and the elytra in part rufo-piceous; the vestiture of the prothorax rather coarse, that of the rest of the upper surface very fine: the head with a complete ochreous line around the eyes, the prothorax with the anterior half rust-red and a median vitta and a large patch at each hind angle ochreous or white, the elytra with a common, transverse, angulate, blackish fascia below the base (extending to the shoulders), and for the rest mottled with cinereous and ochreous, the cinereous scales condensed into interrupted lines on the basal half of the interstices 1, 2, 4, 6, and 8 (a short streak at the middle of 2 conspicuous), each of the seriate punctures also with a small scale; the under surface thickly clothed with coarse whitish scales, the ventral segments 2-4 with two broad vittae down the middle, and 2 with a transverse space on each side, black and almost bare; the legs with scattered, narrow, white scales. Eyes narrowly separated. Joint 2 of the funiculus very elongate, about as long as 3-6 united. Rostrum reaching a little beyond the middle coxae, rugulose and carinate at the base, and smooth thence to the tip. Prothorax much broader than long, narrowing from the base, feebly constricted in front; densely, rugosely punctate. Elytra moderately long, narrowing from a little below the base, blunt at the apex; finely seriate-punctate, the interstices 5, 7, and 9 sharply, and 3 more feebly, carinate, the ridge on 7 and 9 merging into the prominent humeral callus. Meso- and metasternum broad and flattened between the middle coxae. Femora sharply unidentate beneath, the posterior pair carinate externally and not extending beyond the apex of the abdomen, the area on the anterior pair somewhat coarsely strigose. Posterior tibiae rather broad.

Length $5-6\frac{1}{2}$, breadth $2\frac{1}{2}-3\frac{2}{5}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. Larger and broader than *Copturus severini*, Heller, from Colombia, the elytra nigro-fasciate and interruptedly cinereo-lineate on their basal half, the rust-red band on the prothorax extending downwards, the ventral segments 2-4 nigro-bivittate, the anterior femora with a strigose area on its upper anterior face.

3. *Copturomimus octocostatus*, sp. n. (Tab. IV. fig. 20.)

Subovate, black, the elytra mottled with rufo-piceous, the tips of the tarsi ferruginous; thickly clothed with small, intermixed fulvous and cinereous scales, the cinereous scales condensed into two faint submarginal vittae on the prothorax and various scattered patches on the elytra, the elytra also with an interrupted,

transverse, sinuous fascia below the base, and a few small scattered spots, black; the vestiture of the under surface coarser, ochreous, the ventral segments 3-5 almost bare, that of the legs fulvous and cinereous intermixed. Eyes moderately large, narrowly separated. Rostrum carinate and rugulose at the base. Joint 2 of the funiculus elongate, nearly as long as 3-5 united. Prothorax much broader than long, narrowing from the base, strongly constricted in front; densely, rugulosely punctate, and also carinate, the disc somewhat swollen. Elytra narrowing from a little below the base, blunt at the apex, the apices distinctly explanate; rather coarsely seriate-punctate, the punctures distant one from another, the interstices 5, 7, and 9 sharply, and 3 more feebly, costate, the ridges on 7 and 9 merging into the humeral callus. Meso- and metasternum broad and flattened between the intermediate coxæ. Legs rather short; femora unidentate beneath, the posterior pair carinate externally and not reaching the apex of the abdomen; the area on the anterior pair coarsely strigose; tibiæ almost straight.

Length 6, breadth $3\frac{1}{10}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. The cinereo-variegate, nigro-fasciate elytra, with sharply costate alternate interstices and narrowly explanate apices, separate *C. octocostatus* from its allies. It approaches the genus *Copturosomus*.

4. *Copturomimus stridulans*, sp. n. (Tab. IV. figg. 21; 21 *a*, ant. femur.)

Subovate, short, robust, nigro-piceous, the antennæ and the tips of the tarsi ferruginous; sparsely clothed with small, narrow, ochreous and cinereous scales, which are condensed into three interrupted vittæ on the prothorax and various scattered, irregular, more or less confluent patches on the elytra (a small spot near the apex of the eighth interstice usually conspicuous), the rest of the elytral surface with small blackish or fuscous scales, these latter condensed into a common subquadrate patch before the middle of the suture and a Λ -shaped mark towards the apex; the vestiture of the under surface and legs sparse, cinereous. Head sparsely, minutely punctate, the vertex without a smoother space in the middle; eyes very large, narrowly separated; rostrum stout, carinate and rugulose at the base; joint 2 of the funiculus elongate, longer than 3 and 4 united. Prothorax short, narrowing from near the base; densely, rugosely punctate and feebly carinate. Elytra rounded-subquadrate, blunt at the apex; deeply striate, the striæ finely punctate, the interstices flat and rugose. Meso- and metasternum flattened and unimpressed between the intermediate coxæ. Legs short, stout; femora feebly unidentate beneath, the posterior pair carinate externally, the area on the anterior pair large, depressed, and somewhat coarsely strigose; tibiæ almost straight.

Length $3\frac{1}{2}$ - $4\frac{1}{2}$, breadth 2 - $2\frac{1}{2}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Eleven specimens. Near *C. cinereus*, but with a shorter, rugosely punctate prothorax, subtruncate elytra, which have a subquadrate blackish patch near the middle of the suture, a larger strigose area on the anterior femora, and an unimpressed mesosternum.

5. *Copturomimus cæruleotinctus*, sp. n. (Tab. IV. figg. 22, 22 *a*, *b*, σ .)

Subovate, piceous or rufo-piceous, the prothorax black, rufescent at the sides or apex, the elytra each with a large, outwardly narrowed, subtriangular patch on the basal half of the disc (sometimes reaching the suture), a large patch before the apex, and a spot on the humeral callus, black, the rostrum, antennæ, and legs testaceous; the prothorax sparsely clothed with narrow ochreous scales, and sometimes with a white median line in front, the posterior lobe with a metallic blue or green reflection; the elytra mottled with fine, narrow, ochreous and whitish scales, and sometimes with a denser white patch at the sides

beyond the middle, the dark subapical patch with small black scales; the vestiture of the under surface coarse and white, that of the legs also white. Eyes very narrowly separated. Rostrum rugulose, squamose, and carinate at the base, reaching to a little beyond the middle coxæ. Joint 2 of the funiculus very elongate, longer than 3 and 4 united, 3 as long as 1. Prothorax short, somewhat rounded at the sides, narrowed and constricted in front; densely, rather coarsely punctate. Elytra rounded-triangular, blunt at the apex; punctate-striate, the interstices flat and rugulose. Meso- and metasternum flattened between the middle coxæ. Legs moderately long; femora with a minute tooth beneath (sometimes almost obsolete), the intermediate and posterior pairs carinate externally, the area on the anterior pair very finely strigose; the anterior tarsi, and the inner edge of the anterior and intermediate tibiae, clothed with very fine, long, pallid, projecting hairs in the ♂.

Length $2\frac{3}{4}$ - $3\frac{1}{10}$, breadth $1\frac{1}{2}$ - $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); PANAMA, Bugaba (*Champion*).

Two specimens from each locality. This insect, like *Copturus lamprothorax*, has a metallic-blue reflection on the posterior lobe of the prothorax. The entirely pale legs and rostrum, the peculiar markings of the elytra, &c., separate *C. cæruleotinctus* from *C. confluens*. The examples with hairy legs are assumed to be males.

6. *Copturomimus asperatus*, sp. n. (Tab. IV. figg. 23; 23 a, anterior femur.)

Subovate, robust, piceous or nigro-piceous, the antennæ ferruginous; sparsely clothed with ochreous scales, those on the upper surface narrow and those on the under surface coarser, oval or rounded, the prothorax and elytra with scattered bare spaces (a subquadrate patch before the middle of the suture usually conspicuous). Eyes very narrowly separated. Rostrum rugulose punctate and carinate to about the middle, and finely punctate thence to the apex, smoother in the ♀. Joint 2 of the funiculus as long as 3-5 united. Prothorax short, rounded at the sides, constricted and narrowed in front; coarsely, rugosely punctate, and sometimes carinate. Elytra somewhat rounded at the sides, blunt at the tip; punctate-striate, the interstices almost flat, rugulose, and subgranulate. Meso- and metasternum flattened between the middle coxæ. Legs short, rather stout; femora unidentate, the posterior pair carinate externally, the area on the anterior pair oblique, concave, and rather coarsely strigose.

Length $2\frac{1}{2}$ -4, breadth $1\frac{1}{2}$ - $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Jalapa (*Höge*); PANAMA, Bugaba (*Champion*).

Six specimens from Mexico, three from Panama. In this insect the vestiture is almost entirely ochreous, and more or less condensed on the elytra into scattered confluent patches, the spaces between which are almost bare; and the upper surface is rather rough, the elytral interstices being subgranulate. There is an allied unnamed form from Brazil in the Fry Collection with a smaller and differently-shaped strigose area on the anterior femora.

7. *Copturomimus sparsus*, sp. n.

Subovate, piceous, the antennæ and the apical margin of the elytra ferruginous; above and beneath sparsely clothed with narrow, hair-like, cinereous scales, which are condensed into three vittæ on the prothorax and an interrupted line on each elytral interstice, the elytra also with darker scales intermixed, these latter condensed into a transverse, subquadrate patch on the suture at one-third from the base. Eyes very large, almost contiguous. Rostrum stout, not extending beyond the middle coxæ, finely punctate, rugulose and finely carinate at the base. Joint 2 of the funiculus about as long as 3-5 united. Prothorax short, somewhat rounded at the sides, narrowed and constricted in front; densely, rather coarsely punctate and with a short median carina. Elytra punctate-striate, the interstices flat and rugulose.

Meso- and metasternum flattened and unimpressed between the widely-separated intermediate coxæ. Legs short and rather slender; femora unidentate, the posterior pair obsoletely carinate externally, the area on the anterior pair rather large, concave, and finely strigose.

Length 3, breadth $1\frac{1}{2}$ millim.

Hab. GUATEMALA, Cerro Zunil (*Champion*).

One specimen. Smaller and less robust than *C. stridulans*, the eyes almost contiguous, the rostrum finely punctate to the tip, the legs more slender. The cinereous scales on the elytra appear to be a little more crowded at the middle of the first and second interstices.

8. *Copturomimus brevicollis*, sp. n.

Subovate, nigro-piceous, the elytra mottled with rufo-piceous, their apical margin, the rostrum, antennæ, and legs ferruginous; the vestiture fine and rather sparse: the head between the eyes and the prothorax ochreous, the latter with two bare spaces on the disc; the elytra mottled with ochreous and darker scales, the ochreous scales condensed into a small transverse patch on the suture beyond the middle and a narrow streak behind the scutellum; the under surface and legs sparsely clothed with narrow yellowish scales. Eyes very large, narrowly separated above. Rostrum moderately stout, not reaching beyond the middle coxæ, rugulose and carinate at the base. Prothorax nearly twice as broad as long, rounded at the sides, narrowed and constricted in front; densely, rugulosely punctate, and finely carinate. Elytra deeply punctate-striate, the interstices flat and rugulose. Meso- and metasternum flattened between the middle coxæ. Legs short and rather slender; femora unidentate, the posterior pair carinate externally, the area on the anterior pair rather large and finely strigose.

Length $2\frac{3}{5}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Very near the Guatemalan *C. sparsus*, but with the pallid scales finer, ochreous in colour, and clustered into definite markings, the rostrum not so stout, the prothorax shorter and more rounded at the sides, the eyes less approximate above.

9. *Copturomimus cinereus*. (Tab. IV. figg. 24; 24 a.)

Copturomimus cinereus, Heller, Abhandl. Mus. Dresd. no. 11, p. 64¹.

Hab. MEXICO, Orizaba¹, Toxpam (*Sallé*), Jalapa, Cerro de Plumas (*Höge*); PANAMA, Volcan de Chiriqui (*Champion*).

Six specimens of this species are before me, including one of the types. *C. cinereus* agrees with the Colombian *C. ochrofasciatus*, Heller (a co-type of which I have seen), in having the obliquely strigose area on the anterior femora small and partly hidden by the vestiture. The metasternal depression is rather deep.

10. *Copturomimus confluens*, sp. n. (Tab. IV. figg. 25, 25 a, b.)

Subovate, black, the prothorax and elytra sometimes piceous, the antennæ, rostrum, and tarsi more or less ferruginous; the vestiture rather fine above, coarse beneath: the prothorax with the sides broadly, and a space along the middle, ochreous; the elytra with a rather broad basal, median, and apical fascia (extending outwards to the sixth stria), connected along the suture, and a transverse patch behind the

bare humeral callus (connected with the first two fasciæ), ochreous, and a spot at the sides towards the apex white, the rest of their surface with blackish scales; the under surface thickly clothed with oval white scales, the legs with narrow white scales. Eyes very large, subcontiguous. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus elongate, as long as 3 and 4 united. Prothorax short, gradually narrowing from the base; densely, finely punctate. Elytra short, rounded-triangular, blunt at the tip; punctate-striate, the interstices flat and rugulose, the humeral callus smooth. Meso- and metasternum slightly depressed between the intermediate coxæ. Legs short; femora feebly unidentate beneath, the two posterior pairs carinate externally, the area on the anterior pair very finely strigose; tibiæ almost straight.

Length $2\frac{1}{2}$ -3, breadth $1\frac{2}{5}$ - $1\frac{3}{5}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); PANAMA, Volcan de Chiriqui (*Champion*).

Six specimens from Panama and two from Mexico, the latter somewhat worn. A small species, with three vittæ on the prothorax, and three transverse fasciæ on the elytra, ochreous, the fasciæ connected by a whitish or cinereous sutural stripe, the elytra also with a white spot at the sides towards the apex. The allied *C. ochrofasciatus*, Heller, is very much larger, and has a diamond-shaped ochreous patch on the disc of the prothorax and the elytral fasciæ disconnected, the elytra themselves more finely striate.

COPTUROMORPHA, gen. nov.

Joint 2 of the funiculus not or very little longer than 1; mesosternum in the typical forms excavate and with the excavation limited on each side by an oblique ridge; metasternum usually more or less hollowed between the middle coxæ; ventral segments rapidly ascending; legs short; femora not or obsoletely dentate beneath*, the anterior pair with an inconspicuous or faint, impunctate, finely strigose area on their front face.

Type, *C. interrupta*.

The species referred to this genus (which will probably include *Copturus musicus*, Kirsch, from Peru) are all of small size, the typical forms having the mesosternum almost as deeply excavate as in *Pæcilogaster* and the femora unarmed beneath. The relatively shorter second joint of the funiculus separates them from *Copturomimus*. They may be grouped thus:—

- a. Prosternum with a conical tubercle behind each anterior coxa, similar to that on the coxa itself; mesosternum deeply excavate and obliquely bicarinate; metasternum hollowed in the middle in front Species 1-4.
- b. Prosternum without tubercles behind the anterior coxæ.
 - a¹. Meso- and metasternum shallowly depressed between the middle coxæ . . . Species 5.
 - b¹. Mesosternum only depressed between the middle coxæ Species 6, 7.

* In a single minute species from Chiriqui apparently belonging to this genus, too immature to describe, the femora are obsoletely toothed.

1. *Copturomorpha interrupta*, sp. n. (Tab. IV. fig. 26.)

Subovate, piceous, the rostrum and antennæ ferruginous; the prothorax sparsely clothed with rather coarse, narrow, ochreous scales, which are somewhat condensed on the middle of the disc, and with some coarser whitish scales at each hind angle; the elytra mottled with narrow ochreous and fuscous scales, and with a whitish sutural stripe, which is dilated below the base into a cruciform patch and interrupted at the middle by a common V-shaped fuscous mark, the seventh interstice with an ochreous spot at one-third from the apex and the fourth with a similar spot at the base; the vestiture of the under surface coarse, close, and whitish, the ventral segments 3-5 with a space down the middle, and 1 at the sides, almost bare, the legs with narrow whitish scales. Eyes very large, subcontiguous, the intra-ocular space gradually widening above and below. Rostrum rugulose and carinate at the extreme base. Joint 2 of the funiculus slightly longer than 1. Joint 1 of the antennal club longer than the others united. Prothorax transverse, narrowing from near the base, feebly constricted in front; finely, rugulosely punctate, and feebly carinate. Elytra somewhat rounded at the sides, blunt at the tip, depressed along the suture; deeply striate, the striæ finely punctate, the interstices flat and rugulose. Mesosternum broadly depressed, the depression limited on each side by an oblique ridge. Prosternum with a conical prominence behind each coxa, and the coxa itself with a similar prominence. Legs short; femora unarmed beneath and without external carina, the area on the anterior pair very finely strigose, the intermediate and posterior knees with an acute tooth.

Length $4\frac{3}{4}$, breadth $2\frac{1}{2}$ millim.

Hab. MEXICO, Jalapa (*Smith, ex H. F. Wickham*).

One specimen, presented by Mr. Wickham. This insect has the general facies of *Copturomimus stridulans*; but the femora are unarmed beneath, the posterior knees are spinose, and the mesosternum is shaped as in the genus *Pæcilogaster*.

2. *Copturomorpha 11-notata*, sp. n. (Tab. IV. figg. 27, 27 a, b.)

Subovate, piceous; somewhat thickly clothed with piliform ochreous scales, the prothorax with a patch at each hind angle, a short streak on the basal lobe, and the flanks, the elytra with a small transverse patch on the suture at about one-third from the base, a short streak on the suture at one-third from the tip, a minute spot at the base of the fourth interstice, another at the base of the seventh, and yet another on the seventh at one-third from the apex, and the under surface, clothed with rather coarse white scales. Eyes very large, subcontiguous, separated above by a narrow lanciform space. Rostrum rugulose and carinate at the base. Funiculus with joints 1 and 2 rather elongate, subequal in length, 3 and 4 much shorter, 5-7 very short or transverse. Prothorax transverse, somewhat rounded at the sides, narrowed and constricted in front; densely, finely punctate, and feebly carinate. Elytra punctate-striate, the interstices flat and rugulose. Meso- and metasternum broadly depressed between the middle coxæ, the mesosternal depression limited on each side by a fine oblique ridge. Prosternum with a dentiform prominence, similar to that on each anterior coxa. Legs short; femora unarmed beneath, the finely strigose area on the anterior pair just traceable, the posterior knees with an acute tooth.

Length $3-3\frac{1}{2}$, breadth $1\frac{1}{2}-2$ millim.

Hab. GUATEMALA, San Gerónimo (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens, the one from Guatemala immature and partly abraded, the other in perfect condition. Smaller than *C. interrupta*, the two basal joints of the funiculus subequal in length, the markings different.

3. *Copturomorpha rugipennis*, sp. n.

Subovate, nigro-piceous, the antennæ, the tip of the rostrum, and the tarsi more or less ferruginous; sparsely clothed with narrow pale ochreous scales, with darker scales intermixed: the ochreous scales on the prothorax mostly clustered along the sides, at the middle of the base, and in the depressed space in front, and those on the elytra into a transverse basal fascia, a streak on the suture behind the scutellum and another at the middle, and a spot at the sides; the under surface with coarser, oval, pallid scales, the vestiture of the legs similarly-coloured, the posterior femora with an oblique dark ring. Eyes subcontiguous. Rostrum rugulose and finely carinate at the base. Joints 1-2 of the funiculus equal in length, 3 a little shorter, 4-7 short or transverse. Prothorax short, rather convex, constricted and narrowed in front; densely, rugosely punctate, and feebly carinate. Elytra much wider than the prothorax; deeply punctate-striate, the interstices narrow, convex, rugose. Mesosternum deeply excavate between the coxæ. Legs short; femora unarmed beneath, the finely strigose area on the anterior pair inconspicuous and placed near the base.

Length $3\frac{1}{2}$, breadth $1\frac{3}{4}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*).

One specimen. In this species the scattered vestiture is in great part ochreous above, and the incomplete sutural stripe is abruptly interrupted before the middle by a transverse dark patch. Near *C. 11-notata*, but with the elytral sculpture coarser, and the transverse white patch on the suture replaced by a darker one.

4. *Copturomorpha albomaculata*, sp. n. (Tab. IV. fig. 28.)

Subovate, black, the antennæ, tip of the rostrum, and tarsi ferruginous; variegated above with oval white and small narrow black scales: the white scales on the prothorax clustered into three large spots at the base, another in the centre in front, and a minute spot at each anterior angle, and those on the elytra into a narrow sutural stripe, which is broadly interrupted beyond the middle, a short streak at the base of each dorsal interstice, another near the middle of the second, a spot on the seventh at about one-third from the apex, and sometimes another on the fourth in a line with it, the rest of the elytral surface with black scales; the under surface and legs clothed with white scales. Head bare above; eyes subcontiguous; rostrum carinate and rugulose at the base; joints 1 and 2 of the funiculus equal in length. Prothorax short, constricted and narrowed in front; densely, rugulosely punctate, and feebly carinate. Elytra rounded at the sides, blunt at the apex; deeply punctate-striate, the interstices about as wide as the striæ, flattened. Mesosternum deeply excavate between the coxæ, the metasternum abruptly declivous in front. Legs short; femora sulcate and unarmed beneath, the strigose area on the anterior pair inconspicuous and placed near the base.

Length $2\frac{2}{5}$ - $2\frac{3}{5}$, breadth $1\frac{1}{4}$ - $1\frac{1}{2}$ millim.

Hab. GUATEMALA, Dueñas (*Champion*).

Three specimens. Narrower than *C. albosignata* and *C. leucosticta*, the mesosternum deeply excavate, the prothorax with a minute white spot at each anterior angle, the elytra with the white markings less extended, &c. The white scales are coarse, above and beneath.

5. *Copturomorpha albosignata*, sp. n. (Tab. IV. figg. 29, 29 a.)

Subovate, piceous or black, the antennæ, the tips of the tarsi, and the apical margin of the elytra ferruginous; the vestiture close, coarse, long, and piliform: the prothorax with three large patches at the base (the outer one extending forward along the flanks beneath) and a broad transverse band in front, and the elytra with a common cruciform patch at the base, a transverse band below the shoulder,

and a common, broad, undulate, subapical fascia, white, the rest of the elytral vestiture black or blackish, that of the under surface and legs wholly white. Head bare above, closely punctate, without smooth space on the vertex, foveate between the eyes, which are moderately large and narrowly separated; rostrum sparsely punctate, rugulose and carinate at the base, smooth along the middle; joints 1 and 2 of the funiculus equal in length, 3 and 4 much shorter, also equal in length. Prothorax short, rather convex, constricted and narrowed in front; densely, finely punctate, and also carinate. Elytra rather short and broad, depressed along the suture, bluntly and separately rounded at the apex; shining, deeply punctate-striate, the interstices convex, rugulosely punctate. Meso- and metasternum slightly depressed between the middle coxæ. Legs short; femora unarmed beneath and at the apex, and without external carina, the strigose area on the anterior pair oblong.

Var. The elytra with the common subapical fascia reduced to three spots, the transverse subhumeral mark wanting.

Length $2\frac{3}{4}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ –2 millim.

Hab. GUATEMALA, Cerro Zunil (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Three specimens of each form, one only from Guatemala. In this species the markings on the prothorax and elytra are clothed with long, coarse, narrow, hair-like scales, a character separating *C. albosignata* from its nearest allies.

6. *Copturomorpha leucosticta*, sp. n. (Tab. IV. fig. 30.)

Subovate, piceous, the antennæ and tarsi, and the apical margin of the elytra, ferruginous; clothed with oval white scales, the upper surface with intermixed small, brown or fulvous, hair-like scales: the white scales on the prothorax condensed into a median vitta, a transverse patch on each side at the apex, and a large patch at each hind angle (the lateral markings connected externally and almost enclosing subtriangular bare spot), and those on the elytra into a broad sutural stripe (which is interrupted before the middle), a spot on the shoulder, another at the side towards the apex, and a complete or much interrupted line on each dorsal interstice; the legs with narrow white scales. Head bare above, closely punctate; eyes large, subcontiguous in front; rostrum rugulose and subcarinate at the base; joints 1 and 2 of the funiculus equal in length. Prothorax short, densely, rugosely punctate. Elytra shining, deeply punctate-striate, the interstices not wider than the striæ, rugulose and subgranulate. Mesosternum slightly depressed between the coxæ. Legs short; femora unarmed, the strigose area on the anterior pair small.

Length 3 – $3\frac{1}{3}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens, one with the dorsal interstices of the elytra albolineate to near the apex, the other with the white lines reduced to a few scattered streaks. Near *C. albosignata*, but with the white scales on the upper and under surfaces oval in shape, the head not foveate between the eyes, the elytra more rugose.

7. *Copturomorpha funerea*, sp. n.

Short ovate, black, the antennæ, the apical margin of the elytra, the apices of the tibiæ, and the tarsi, ferruginous; the prothorax with a few narrow white scales at the hind angles and along the sides; the elytra clothed with narrow black and white scales, the latter condensed into some small spots at the base, a spot at the middle of the suture, another at its apex, and another on the eighth interstice; the vestiture of the legs and under surface white, the posterior femora with an oblique fuscous band beyond the middle. Eyes almost contiguous in front, narrowly separated above. Rostrum thickly punctate to the tip, rugose at the base. Joint 2 of the funiculus a little longer than 1. Prothorax very short, rounded at the sides, constricted and narrowed in front; densely, rugosely punctate, and obsoletely carinate. Elytra rather

convex, much wider than the prothorax, subcordate, blunt at the apex, depressed along the suture anteriorly; very deeply punctate-striate, the interstices rugose, not wider than the striae. Mesosternum shallowly depressed. First ventral segment broadly flattened down the middle. Legs short; femora unarmed, carinate externally, the finely strigose area on the anterior pair transverse and placed near the base.

Length $2\frac{1}{8}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).¹

One specimen. Very like some of the smaller *Lechriops*, but easily distinguishable from them by the conspicuous finely strigose area near the base of the anterior femora.

COPTURUS.

Zygops, subgen. *Coptorus*, Schönherr, Curc. Disp. Meth. p. 302 (1826).

Copturus, Schönherr, Gen. Curc. iv. p. 623 (1838) (part.); Lacordaire, Gen. Col. vii. p. 152 (part.); Heller, Abhandl. Mus. Dresd. no. 11, pp. 4, 19.

The numerous forms here referred to *Copturus* have the second joint of the funiculus more or less elongate, the prosternum without tubercles behind the anterior coxae, the mesosternum flattened or feebly excavate (rarely with a lamelliform prominence on each side between the coxae), the metasternum, at most, depressed or foveate in front, and the femora armed with one or two teeth beneath, their apices sometimes acute or spined. Dr. Heller (*l. c.*) enumerates seventy species as belonging to it, and divides them into six groups or subgenera, two of which (I. and V.) do not appear to be represented within our limits; his group III., to which most of the Central-American *Copturi* belong, includes such diverse forms as *C. avicularis*, *C. deplanus*, *C. mexicanus*, *C. ludiosus*, and *C. lamprothorax*. Amongst the new species now added there are several that do not fall into any of these groups: *C. centralis*, *C. exaratus*, and *C. verrucosus* approach the genus *Copturosomus*; and *C. furfuraceus* forms a sort of connecting-link between *Copturus* and *Lechriops*. The last-mentioned genus, the type of which is *L. sciurus* (Fabr.), includes most of the smaller forms with a complete rostral canal and dentate femora.

The Central-American *Copturi* (excluding *C. latitarsis*) may be grouped thus:—

- I. Meso- and metasternum flattened or at most slightly depressed between the middle coxae*; joint 2 of the funiculus elongate (except in *C. fulvosignatus*†); femora uni-, rarely bi-, dentate.
 - A. Species oblong-ovate or oblong-elliptic, large, with coarsely punctate-striate elytra, the apices of which are sometimes sharply dentate in the ♀ (*C. deplanus*), the posterior knees acute or spined. [MACROCOPTURUS and part of Group III. of Heller.] Nos. 1–4.

* The metasternal depression is deeper in *C. neohispanicus*.

† This species would be almost as well placed in *Damurus*, Heller.

- B. Species subovate, with broad elytra, the interstices of which are feebly convex or costate, and slender legs Nos. 5, 6.
- C. Species subovate, with gibbous, sharply carinate prothorax, broad, nodose elytra, and slender legs No. 7.
- D. Species subelliptic, with narrow eyes and laterally constricted elytra, the latter nodose towards the apex, and with the apex itself dentiform No. 8.
- E. Species subelliptic, with the vestiture close above and sparse beneath, the scales on the elytra small and rounded, the legs slender, the eyes large . . . No. 9.
- F. Species elliptic, with finely striate elytra and strongly compressed posterior femora, the vestiture of the upper surface fine, the femora bi- or unidentate. [EUCOPTURUS, Heller.] Nos. 10-14.
- G. Species elliptic or subelliptic, with deeply striate elytra, the interstices of which are somewhat costate, the eyes large, the femora unidentate, the posterior pair seldom extending beyond the apex of the abdomen. [Group IV. and part of Group III. of Heller.] Nos. 15-33.
- H. Species subelliptic, with a subconical prothorax, deeply punctate-striate elytra, and short, stout legs, the anterior femora unarmed, the others sharply unidentate No. 34.
- II. Mesosternum hollowed down the centre, with a flattened prominence on each side between the middle coxæ; joint 2 of the funiculus very little longer than 3; femora unidentate; eyes large: species small No. 35.
- III. Mesosternum depressed anteriorly, with a triangular, flattened prominence on each side between the middle coxæ, the tip of the rostrum received in a deep foveiform cavity in the front of the metasternum; eyes large; joint 2 of the funiculus elongate; femora unidentate No. 36.
- IV. Mesosternum vertical, deeply excavate, the metasternum also excavate in front; joint 2 of the funiculus elongate; prothorax conical; ventral segments gradually ascending; femora unidentate, the knees with a long spine No. 37.

1. *Copturus martæ*. (Tab. V. fig. 1.)

Copturus (*Macrocopturus*) *martæ*, Heller, Abhandl. Mus. Dresd. no. 11, p. 25¹.

Copturus orpheus, in coll. Pascoe.

♂. Ventral segment 1 broadly and shallowly depressed down the middle, 5 truncate at the apex.

Hab. PANAMA, Bugaba (*Champion*).—COLOMBIA, Santa Marta¹.

One specimen, differing from the type, and from examples from the same locality in the Pascoe and Fry Collections, in having a more distinct short median carina on the prothorax. *C. martæ* is scarcely more than a variety of *C. expletus*, Pasc., from Pará, the latter having the three narrow vittæ on the prothorax straight and the sutural region of the elytra broadly depressed and squamose.

2. *Copturus avicularis*. (Tab. V. fig. 2.)

Copturus avicularis, Boh. in Schönh. Gen. Curc. iv. p. 630¹; Heller, Abhandl. Mus. Dresd. no. 11, p. 27, tab. fig. 26².

Hab. MEXICO (*Koltze*, in *Mus. Dresden*; *Mus. Brit.*), Vera Cruz (*Chevrolat*¹), Toxpam (*Sallé*), Cerro de Plumas (*Höge*).

This species has the elytra somewhat rounded at the sides, the prothorax long and conical, the femora not carinate externally, the femoral tooth long and stout, these characters separating it from *C. mexicanus* and other allied forms. The six specimens before me appear to be of the female sex, as they have the first ventral segment unimpressed; they vary from $5\frac{1}{2}$ –9 mm. in length.

3. *Copturus deplanus*. (Tab. V. figg. 3, ♀; 4, ♂.)

♂. *Rhynchanus deplanus*, Fabr. Syst. Eleuth. ii. p. 476¹.

♂. *Copturus deplanus*, Boh. in Schönh. Gen. Curc. iv. p. 626².

♂. *Copturus scapha*, Kirsch, Berl. ent. Zeitschr. 1869, p. 206³; Heller, Abhandl. Mus. Dresd. no. 11, pp. 28, 68⁴.

♀. *Copturus bispinus*, Buq. in litt.⁵.

♂. Ventral segment 1 shallowly sulcate down the middle, 5 broadly truncate at the apex; elytra obtusely angulate at the tip.

♀. Ventral segment 1 unimpressed, 5 bluntly rounded at the apex; elytra each with a long sharp spine at the tip.

Hab. NICARAGUA, Chontales (*Janson*: ♀); COSTA RICA, San Carlos (*Mus. Dresden*: ♂); PANAMA, Tolé (*Champion*: ♂).—SOUTH AMERICA¹², Bogota³ (*Mus. Dresden*: ♂), Ecuador, Cayenne (*Mus. Brit.*: ♀).

There can be no doubt that the sexes of this species differ in the way noted, such minute characters as the serrulate outer apical margin of the elytra, &c., being common to both male and female. Dr. Heller has been kind enough to communicate the type of *C. scapha* for examination.

4. *Copturus mexicanus*. (Tab. V. fig. 5, ♂.)

Copturus mexicanus, Heller, Abhandl. Mus. Dresd. no. 11, p. 28¹.

♂. Ventral segment 1 broadly depressed down the middle, 5 truncate and hairy at the apex.

Hab. MEXICO (*Mus. Brit.*), Cordova (*Sallé*), Oaxaca (*coll. Faust*¹), Teapa (*H. H. Smith*); GUATEMALA, Teleman and Cubilguitz in Vera Paz (*Champion*); NICARAGUA, Chontales (*Janson*).

The few specimens of *C. mexicanus* before me, including one of the types, are all of the male sex. The single (worn) example from Chontales has the elytral interstices sharply costate, and it may belong to a different species.

5. *Copturus centralis*, sp. n. (Tab. V. fig. 6.)

Copturus centralis, Chevr. in litt.

Subovate, flattened above, nigro-piceous; clothed with small intermixed ochreous (or flavo-cinereous) and blackish (or fuscous) scales, the ochreous scales on the prothorax condensed into three irregular vittæ

(the central one interrupted), the elytra with a transverse ochreous patch on the suture beyond the middle, the blackish scales becoming more crowded on the second and third interstices and there condensed into lines (which extend from a little below the base to the transverse ochreous patch, the inner one continued beyond it); the under surface rather sparsely clothed with intermixed white, ochreous, and fuscous scales; the vestiture of the legs in great part fuscous, the intermediate and posterior femora with a broad ochreous and white annulus on their outer face. Eyes very large, narrowly separated. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus elongate, as long as 3-5 united, 3 and 4 equal in length, 5-7 transverse. Prothorax short, narrowing from near the base, strongly constricted in front; densely, rugulosely punctate, and with a short median carina. Elytra nearly one-half wider than the prothorax, slightly rounded at the sides, gradually narrowing from about the middle, blunt at the apex, depressed along the suture, the humeri swollen; punctate-striate, the interstices rather convex. Intermediate coxæ widely separate, the intervening space flattened. Legs short; femora feebly unidentate, the tooth on the anterior pair almost obsolete.

Length $4\frac{1}{2}$ - $5\frac{1}{10}$, breadth $2\frac{1}{2}$ -3 millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); PANAMA, Volcan de Chiriqui (*Champion*).

Four specimens, the one from Panama darker than the others and with the elytra less rounded at the sides. The broad, rounded-subquadrate elytra, with blackish lines on the disc near the suture, interrupted by a transverse ochreous patch, sufficiently distinguish *C. centralis*.

6. *Copturus exaratus*, sp. n.

Very near *C. centralis*, but smaller, the scattered ochreous scales not condensed into definite markings (the transverse patch on the suture of the elytra wanting), the blackish scales predominating on the elytra, the posterior femora with an ochreous annulus at the apex (instead of at the middle); joint 2 of the funiculus as long as 3-6 united; prothorax more finely, rugulosely punctate; elytra with the interstices 3-9 narrowly costate throughout; legs more slender, femora each with a short tooth, tarsi ferruginous.

Length $3\frac{1}{2}$, breadth $1\frac{3}{4}$ millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One worn specimen, easily separable from *C. centralis* by the narrowly costate elytral interstices. The elytra appear to have a broad dark fascia before the middle, extending for a short distance down the suture posteriorly.

7. *Copturus verrucosus*, sp. n. (Tab. V. figg. 7, 7 a.)

Subovate, shining, nigro-piceous, the antennæ and tarsi, and the apical margin of the elytra, more or less ferruginous; sparsely clothed above and beneath with small, narrow, ochreous scales, which are condensed on the elytra into a transverse patch on the suture beyond the middle, the rest of the elytral surface with intermixed black scales. Head comparatively small, the eyes moderately large, well-separated above; rostrum rugulose and carinate at the base; antennæ with a stout, ovate club, its first joint as long as the others united, joint 2 of the funiculus about as long as 3-7 united, 3 a little longer than 4, 5-7 transverse. Prothorax short, rounded at the sides, narrowed and strongly constricted in front, with rounded ocular lobes; densely, rugulosely punctate, the posterior lobe convex on the disc and with a prominent arcuate carina. Elytra flattened, fully one-half wider than the prothorax, somewhat rounded at the sides, blunt and slightly explanate at the apex, transversely depressed on the disc below the base, the humeri swollen; punctate-striate and feebly granulate, the interstices (1 and 2 excepted) each with a sharp, much interrupted ridge. Intermediate coxæ widely separated, the intervening space

flattened. Legs slender, short; femora feebly unidentate, the posterior pair carinate externally and not reaching the apex of the abdomen.

Length $4\frac{1}{10}$, breadth $2\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One rather worn specimen. This insect is easily recognizable by the sharply raised, much interrupted ridges on the elytra, and the prominent arcuate carina on the prothorax. These characters separate *C. verrucosus* from its nearest ally, *C. centralis*, which also has larger eyes, longer and stouter legs, &c. Both species seem to approach the *Copturophanus*-section of *Copturosomus*, Heller.

8. *Copturus constrictus*, sp. n. (Tab. V. figg. 8, 8 a.)

Subelliptic, flattened above, black, the antennæ obscure ferruginous; the vestiture close and fine, sparser and longer on the prothorax and denser between the elytral prominences: the head with a fulvous white-edged line around the eyes; the prothorax with a broad rust-red or fulvous space in front, which is followed on each side by a transverse white streak (the fulvous patch extending down the sides to near the base in the Mexican specimen, bordered within by an oblique white streak, and enclosing a white spot on the flanks); the elytra with a common, curved fascia between the two prominences on the disc (and in the Mexican specimen the suture thence to the base) pure white, the rest of their surface clouded with narrow intermixed white and fulvous scales, a transverse or oblique patch on the disc below the base and the small depressed area at the sides almost bare; the under surface densely clothed with coarse oval white scales, the ventral segments 3-5 with narrow scales; the legs with intermixed narrow fulvous and white scales. Eyes narrow, moderately large, well-separated above. Rostrum rugulosely punctate and carinate at the base. Joint 2 of the funiculus elongate, longer than 3 and 4 united, these latter equal in length, 5-7 transverse. Prothorax transversely strongly constricted and narrowed in front; closely, rather coarsely punctate, and feebly carinate. Elytra abruptly constricted at the sides before the middle, the apices each produced into a rather long, flattened tooth; punctate-striate, the dorsal interstices feebly, the others more strongly, convex, 5 raised and swollen at its point of termination. Meso- and metasternum flattened between the middle coxæ. Legs short; femora unidentate, the knees unarmed.

Length $3\frac{1}{2}$ -5, breadth 2- $2\frac{1}{2}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); PANAMA, Bugaba (*Champion*).

Two specimens, differing in the markings of the prothorax and in the length of the flattened lobes at the apex of the elytra. The laterally constricted, binodose, bicaudate elytra and the narrow eyes readily distinguish *C. constrictus*. The Mexican example, which can be taken as the type, is figured.

9. *Copturus unifasciatus*, sp. n. (Tab. V. figg. 9, 9 a.)

Subelliptic, flattened above, shining, reddish-brown, the anterior and intermediate femora and the side-pieces of the mesosternum nigro-piceous, the tarsi ferruginous; thickly clothed above with small ochreous scales—those on the prothorax elongate and those on the elytra rounded and closely packed,—the prothorax with two sinuous vittæ on the disc, and the elytra with an irregular, interrupted, undulate fascia before the middle, reddish-brown, the humeri bare; the under surface and legs sparsely clothed with small, piliform, whitish scales. Eyes large, subcontiguous. Rostrum rugulosely punctate and carinate at the base. Antennæ with a stout oblong-ovate club; joint 2 of the funiculus nearly as long as 3-6 united, 3 and 4 equal in length, 5-7 transverse. Prothorax short, narrowing from the base, constricted in front; densely, finely punctate, and feebly carinate. Elytra rather long, much wider than the prothorax, gradually narrowing from a little below the base, depressed along the suture; punctate-striate, the

interstices feebly convex. Meso- and metasternum broadly flattened between the middle coxæ. Legs short; femora unidentate, the posterior pair carinate externally, the knees without spines. Length $3\frac{2}{3}$, breadth 2 millim.

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. This species has the elytra clothed with closely-packed, small, rounded scales, which are ochreous in colour, except upon the undulate, interrupted, ante-median fascia, where they are reddish-brown. The prothorax has three broad ochreous vittæ. The legs are slender.

10. *Copturus lynceus*, sp. n. (Tab. V. fig. 10.)

Elliptic, flattened above, nigro-piceous or piceous, the prothorax sometimes rufescent, the antennæ ferruginous; the head with a line behind the eyes, the prothorax with a median vitta, a transverse patch on each side in front, and a patch at each hind angle, the scutellum, and the elytra with a sutural stripe (dilated at the base and at the middle) and two transverse fasciæ on the outer part of the disc (the posterior one sometimes reduced to a small spot), ochreous, the elytra also with a white spot on the outer margin just before the apex, the rest of the vestiture of the upper surface very fine and sparse, and partaking of the ground-colour; the under surface and legs thickly clothed with narrow whitish or flavo-cinereous scales, the ventral segments 2-5 with a bare spot on each side. Eyes extremely large, contiguous. Rostrum arcuate, rugulose and carinate at the base, and smooth thence to the tip. Funiculus slender; joint 2 nearly as long as 3-7 united, 3 and 4 subequal in length, each a little shorter than 1. Prothorax transverse, narrowing from the base, constricted in front; densely, minutely punctate. Elytra oblong-cordate, depressed along the suture; finely striate, the striæ feebly punctate, the interstices rather convex, minutely punctulate. Mesosternum slightly depressed. Legs moderately long, the femora bidentate beneath, the minute outer tooth sometimes wanting, the posterior pair strongly compressed and about reaching the apex of the elytra, the intermediate and posterior pairs carinate on their outer face; intermediate and posterior tibiæ rather broad, rounded externally. Length $6-6\frac{1}{2}$, breadth $2\frac{1}{2}-3$ millim.

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt*).

The Guatemalan specimen is taken as the type, the other two being somewhat rubbed and having the ochreous markings reduced in size. *C. lynceus* belongs to the subgenus *Eucopturus* of Heller; it is nearly related to *C. rhombifer* and *C. suturalis*, from Cayenne.

11. *Copturus fulvomaculatus*, sp. n. (Tab. V. fig. 11.)

Elliptic, concave above, black, the antennæ and the tips of the tarsi ferruginous; variegated above with a dense clothing of small narrow scales: the head with a line behind the eyes, and the prothorax with five vittæ (the central one narrow, angularly dilated at about the middle, the submarginal one mesially constricted, the outer one angulate and almost invisible from above), fulvous, the exterior one edged with white; the elytra blackish-brown, with various irregular fulvous spots, one on either side of the suture just below the base and a smaller one close to the middle of the suture edged with white, the intervening portion of the suture also white; the under surface variegated on each side with coarser white, fulvous, and blackish-brown scales, the ventral segments 2-5 blackish-brown, maculated with white; the legs with intermixed narrow fulvous and white scales, the intermediate femora narrowly, and the posterior femora broadly, annulate with blackish-brown. Eyes very large, subcontiguous. Rostrum carinate and closely punctate at the base, smooth thence to the tip. Joint 2 of the funiculus elongate, nearly as long as 3-6 united, 3 very little longer than 5, 4 fully twice as long as 3, 5-7 short. Prothorax transverse, narrowing from the base, constricted in front; densely, very finely punctate. Elytra oval, obliquely

truncate at the tip, the sutural angle rounded, the sutural region broadly depressed; finely punctate-striate, the interstices flat on the disc. Meso- and metasternum flattened between the middle coxæ. Legs rather short; anterior femora bidentate, intermediate and posterior femora with a blunt lamelliform prominence exterior to the other tooth, both pairs sharply carinate externally; posterior tibiæ comparatively broad.

Length $5\frac{3}{4}$ – $6\frac{1}{4}$, breadth $2\frac{9}{10}$ – $3\frac{1}{10}$ millim.

Hab. NICARAGUA, Chontales (*Belt*).

Two specimens. The elytral markings in this species are fulvous, and in part edged with white, as in *Zygops amœnula*, an insect also occurring at Chontales. The bidentate femora and the relatively long fourth joint of the funiculus are also characteristic. *C. fulvomaculatus* belongs to the section *Eucopturus*, Heller.

12. *Copturus sericeus*, sp. n. (Tab. V. fig. 12.)

Elliptic, robust, opaque, piceous or nigro-piceous, the rostrum, and sometimes the legs in part, rufescent, the antennæ ferruginous; the vestiture close and very fine: the head with a line around the eyes, and the prothorax with three vittæ (sometimes connected in front, the central one enclosing a short, bare, median line), ochreous; the elytra with a broad transverse space at the base and another at the middle, connected along the suture, a spot at the sides at about one-third from the apex, the apical portion of the suture, and various undulate interrupted fasciæ or scattered spots, sordid ochreous or flavo-cinereous, the rest of the vestiture fuscous; the under surface with coarser whitish scales, the fifth ventral segment with a bare spot. Eyes extremely large, very narrowly separated. Rostrum rugulose and carinate at the base, and sparsely, minutely punctate thence to the tip. Joint 2 of the funiculus as long as 3–5 united, 3 and 4 subequal in length. Prothorax transverse, narrowing from the base, strongly constricted in front; densely, minutely punctate, rugulose on each side of the smooth, cariniform, median line. Elytra somewhat oval, blunt at the tip, depressed along the suture anteriorly; finely punctate-striate, the interstices feebly convex. Meso- and metasternum flattened between the middle coxæ, the mesosternum slightly swollen on each side. Legs short and stout; femora broad, sharply unidentate beneath, the posterior pair carinate externally and strongly compressed.

Length $5\frac{1}{2}$ – $5\frac{3}{5}$, breadth $2\frac{1}{2}$ – $2\frac{3}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Three specimens, two of them somewhat immature. Distinguishable by the fine silky vestiture, the comparatively smooth prothorax, the finely striate elytra, and the broad femora. *C. sericeus* seems to belong to the subgenus *Eucopturus* of Heller; the femora are nearly as broad as in *Cyphocopturus tristis*.

13. *Copturus maculosus*, sp. n. (Tab. V. fig. 13.)

Very like *C. sericeus*, but with the vestiture a little coarser, the median vitta of the prothorax interrupted; the prothorax closely, uniformly punctate, and also carinate; the elytra a little less rounded at the sides, the apices more abruptly truncate, the striæ distinctly punctate, the sutural region less depressed; the meso- and metasternum slightly depressed between the middle coxæ; the fifth ventral segment without a bare spot in the middle; the legs not so stout, the femora narrower; the eyes subcontiguous.

Length $4\frac{2}{5}$ – $4\frac{7}{8}$, breadth $2\frac{1}{8}$ – $2\frac{2}{5}$ millim.

Hab. PANAMA, Volcan de Chiriqui, Bugaba (*Champion*).

Two specimens, easily separable from *C. sericeus* by the characters given, the

difference in the sculpture of the prothorax alone being sufficient to distinguish them. The elytral markings are similar. *C. maculosus* has the general facies of *C. histricus*.

14. *Copturus tricolor*, sp. n. (Tab. V. figg. 14, 14 a.)

Subelliptic, flattened above, black, the antennæ obscure ferruginous, the vestiture dense and fine: the eyes encircled by an ochreous line; the prothorax with four sharply-defined black vittæ, extending from the base to the carmine-red band in front, the two vittæ on each side usually connected anteriorly, the outer one coalescent with the transverse black fascia running down the flanks, the intervening spaces ochreous; the elytra brownish or purplish-brown variegated with cinereous, the cinereous scales condensed into a curved patch on each side of the suture at the base, two or three spots at the sides, and a stripe down each alternate interstice; the under surface white or yellowish-white, variegated with black along the sides, the ventral segment 2 with a broad, posteriorly trilobate black band in front, the median branch running downwards to the apex of 5. Eyes very narrowly separated. Rostrum rugulosely punctate and carinate at the base, the lateral sulci (scrobes) extending forwards to near the apex. Joint 2 of the funiculus nearly as long as 3 and 4 united. Prothorax transverse, gradually narrowing from the base, constricted in front; densely, finely punctate. Elytra narrowing from a little below the base, obliquely truncated at the apex; finely striate, the striæ feebly punctate, the interstices flat. Meso- and metasternum slightly depressed between the middle coxæ. Femora unidentate, the posterior pair strongly compressed, not reaching beyond the apex of the abdomen, and with the inner apical lobe spiniform, the intermediate and posterior pairs carinate externally.

Length 6-7, breadth $3-3\frac{1}{2}$ millim.

Hab. MEXICO, Cordova (*Sallé*); GUATEMALA, Senahu in Vera Paz (*Champion*); NICARAGUA (*Sallé*), Chontales (*Belt*).

Five specimens. Larger than *C. neohispanicus*; the prothorax with the four sharply-defined black vittæ on the posterior lobe separated by ochreous interspaces; the elytra with a common, interrupted, ∞ -shaped cinereous patch at the base, finely striate, the interstices flat; the metasternum without definite impression between the middle coxæ.

15. *Copturus montezuma*, sp. n. (Tab. V. fig. 15.)

Copturus (*Eucopturus*) *montezuma*, Heller, in litt.

Subelliptic, robust, black, the antennæ ferruginous, the vestiture close and fine: the head with an ochreous line around the eyes which becomes red above; the prothorax black, with three narrow ochreous vittæ extending forwards to the carmine-red band in front; the elytra black or blackish-brown, with a small subquadrate patch on the suture at the base, an oblique streak below the shoulder, and various interrupted lines on the disc, ochreous or fulvous, the rest of the suture and two transverse streaks at the sides (one at about the middle, the other midway between this and the apex) white; the under surface white, except upon the large, almost bare spaces extending across the flanks, metasternum, and abdomen, the second ventral segment with a median vitta, and the fifth with a transverse space at the apex, also black. Eyes narrowly separated. Joint 2 of the funiculus very elongate, about as long as 3-6 united. Prothorax short, gradually narrowing from near the base, feebly constricted in front; densely, finely punctate and obsoletely carinate. Elytra somewhat cordate, depressed along the suture; rather coarsely punctate-striate, the interstices convex. Meso- and metasternum flattened between the coxæ. Legs moderately long; femora unidentate, the posterior pair strongly compressed, reaching a little beyond the apex of the abdomen, the intermediate and posterior pairs carinate externally, the inner apical lobe of the latter acute.

Length 6-6 $\frac{1}{2}$, breadth $3\frac{1}{10}$ -3 $\frac{1}{2}$ millim.

Hab. COSTA RICA, San Carlos (*Mus. Dresden*); PANAMA, Bugaba (*Champion*).

Found in profusion at Bugaba on the bark of an enormous fallen tree in a forest clearing which had been burnt to plant rice. More robust than *C. tricolor*, the markings different, the elytra subcordate, the second joint of the funiculus very elongate. *C. montezuma* differs from the S.-American *C. rubricollis*, Gyll., in having the elytra longer and laterally trifasciate, the prothorax with three narrow ochreous vittæ on the posterior lobe, the eyes less approximate; the elytral interstices convex.

16. *Copturus neohispanicus*. (Tab. V. fig. 16.)

Copturus neohispanicus, Heller, Abhandl. Mus. Dresd. no. 11, p. 33¹.

Hab. MEXICO (*Koltze*¹, in *Mus. Dresden*).

The type of this species has been communicated by Dr. Heller. It may be at once separated from the other similarly-coloured Central-American forms (*i. e.* those with the vestiture of the anterior portion of the prothorax fiery-red) by the very finely and narrowly costate elytral interstices, and the excavate anterior portion of the metasternum. The ventral segments 1 and 2 have an almost bare transverse space on each side in front. The Colombian *C. severini*, Heller (the type of which I have seen), is very like *C. neohispanicus*, and has a similarly excavate metasternum; but it is more elongate, the alternate elytral interstices are more sharply costate, and the legs are a little longer.

17. *Copturus cincticollis*, sp. n. (Tab. V. fig. 17.)

Subelliptic, black, the antennæ and the apical margin of the elytra obscure ferruginous, the vestiture close and fine: the head with a rufous line around the eyes above; the prothorax with three short whitish vittæ extending from the base to the broad carmine-red band in front, the outer one continued downwards on to the humeri and mesosternal side-pieces and connected anteriorly with the oblique white stripe running down the flanks, the intervening spaces on the posterior lobe almost bare; the elytra with a small subquadrate scutellar patch, a transverse mark below it, and the suture thence to the apex, whitish, these markings partly included within a common Y-shaped black patch extending from the shoulders to the apex, the rest of the vestiture fulvous streaked with black; the under surface white, with transverse black spaces along the sides and a small spot at the apex of the last ventral segment. Eyes subcontiguous. Rostrum rugulose punctate and carinate at the base. Funiculus with joint 2 as long as 3-5 united. Prothorax strongly transverse, narrowing from the base; densely punctate. Elytra narrowing from a little below the base, blunt at the apex; finely punctate-striate, the interstices feebly convex, flat near the suture. Meso- and metasternum slightly depressed between the middle coxæ. Legs rather short; femora unidentate, the posterior pair with a minute additional tooth, the intermediate and posterior pairs carinate externally.

Length 3-4, breadth $1\frac{1}{2}$ -2 millim.

Hab. PANAMA, Bugaba (*Champion*).

Many specimens. Smaller than *C. neohispanicus*, the elytra differently marked, their interstices not costate, the prothorax (as seen from above) with a subquadrate whitish patch at each hind angle partly enclosing a black spot, the metasternum without definite impression between the middle coxæ, the eyes more approximate.

18. **Copturus quadricolor**, sp. n. (Tab. V. fig. 18.)

Very like *C. cincticollis*, but with the transverse carmine-red band on the front of the prothorax divided into two large spots, which are rounded posteriorly and rapidly narrowed beneath, the ochreous median vitta continued to the apex; the elytra with a common triangular black patch at the base, extending outwards to the humeri and enclosing an oblong, subquadrate, ochreous scutellar patch, the vestiture thence to the apex brown intermixed with white, the white sutural stripe wanting.

Length 4, breadth 2 millim.

Hab. NICARAGUA, Chontales (*Janson, in coll. Fry*).

One specimen. This is the Nicaraguan form of *C. cincticollis* and it requires a distinctive name.

19. **Copturus ruficollis**, sp. n. (Tab. V. fig. 19.)

Very like *C. cincticollis*, but with the dark markings of the elytra not extending beyond the basal third, the vestiture thence to the apex uniformly fulvous, the seriate punctures each with a white hair-like scale; the ventral segments clothed throughout with white scales.

Length 3-3½, breadth 1½-1¾ millim. (? ♀.)

Hab. GUATEMALA, Chacoj in Vera Paz (*Champion*); PANAMA, Bugaba (*Champion*).

Two specimens. Perhaps an extreme form of *C. cincticollis*? A worn specimen (? ♂) from Chontales, Nicaragua (*Janson*), probably belongs to *C. ruficollis*, though it has the eyes somewhat widely separated above. The sexes of *Hoplocopturus scintillans* differ in a similar way.

20. **Copturus conturbatus**. (Tab. V. fig. 20.)

Copturus conturbatus, Heller, Abhandl. Mus. Dresd. no. 11, p. 31¹.

Copturus miniatus, Chevr. in litt.².

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*¹).

This insect may be known by the colour and arrangement of the vestiture. The head has a line behind the eyes above, and the prothorax a large transverse patch on each side in front (the two patches connected along the anterior margin), fiery-red; the prothorax has three whitish or cinereous patches at the base (the outer one enclosing a small black spot); the elytra are mottled with cinereous (or whitish) and black, the cinereous scales condensed into large patches along the suture and on the apical half; the under surface and legs are uniformly whitish.

21. **Copturus torquatus**. (Tab. V. fig. 21.)

Copturus torquatus, Heller, Abhandl. Mus. Dresd. no. 11, p. 32¹.

Hab. MEXICO¹, Toxpam in Vera Cruz (*Sallé*).

Apparently peculiar to Eastern Mexico. The vestiture in this species is coloured thus:—The head has a line behind the eyes above, and the prothorax the apical third, rufous, the latter with three patches at the base, and the elytra with a common

V-shaped scutellar mark, pale metallic blue, the elytra for the rest broadly black at the base and brownish or cinereous thence to the tip, the under surface white.

22. *Copturus lamprothorax*. (Tab. V. figg. 22, 23.)

Copturus lamprothorax, Heller, Abhandl. Mus. Drësd. no. 11, p. 32¹.

Copturus lamprothorax, var. ? *latior*, Heller, loc. cit. p. 33².

Var. The elytra variegated with fuscous or black, sometimes with an oblique interrupted band extending across the disc from the scutellum to near the middle of the eighth stria and then continued downwards to the subapical spot, the white sutural stripe dilated at the middle, and some other white scales usually present on the disc and in front of the humeral callus. (Fig. 23.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); GUATEMALA, San Gerónimo, Las Mercedes, Dueñas (*Champion*); NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba, Volcan de Chiriqui, Caldera, Tolé (*Champion*).

Found in numbers in Chiriqui. The form with variegated elytra has been found in quantity, both in Chiriqui and at Toxpam, and it is connected by intermediate forms. The var. *latior*, Heller, is based upon a single discoloured example with the elytra a little broader than usual. The subapical dark spot is often wanting. The prothorax has the sides and a stripe down the middle clothed with flattened metallic-blue or green scales. The eyes are more approximate, and the rostrum a little longer and smoother, in the female than in the male. The length varies from 2–3½ millim. The two specimens figured are from Toxpam.

23. *Copturus atosignatus*, sp. n. (Tab. V. fig. 24.)

Elliptic, nigro-piceous, the antennæ, the basal half of the rostrum, and the legs ferruginous, the elytra rufo-piceous, with a broad, oblique, blackish fascia below the shoulders; the vestiture close and fine: the head with an ochreous line around the eyes; the prothorax with three sharply-defined vittæ formed by intermixed ochreous and white scales; the elytra with the base broadly, the suture, the second interstice to beyond the middle, and an interrupted oblique fascia towards the apex, whitish or ochreous, the rest of their vestiture blackish; the scales on the under surface and legs white. Eyes large, very narrowly separated. Joint 2 of the funiculus elongate. Prothorax very short, densely punctate and subcarinate. Elytra deeply punctate-striate, the interstices rugulose and almost flat. Meso- and metasternum flattened between the middle coxæ. Legs short, slender; femora sharply unidentate beneath.

Length $2\frac{1}{10}$ – $2\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{1}{3}$ millim.

Hab. MEXICO, Toxpam (*Sallé*), Teapa (*H. H. Smith*).

Two specimens, precisely alike. Very like *C. lamprothorax*, but without trace of metallic colour on the prothorax, the three pallid vittæ sharply defined, the elytra with a broad, oblique fascia below the shoulder, a streak on either side of the suture towards the apex, and a patch at the sides in a line with it, infuscate or black.

24. **Copturus quadricinctus.** (Tab. V. fig. 25.)

Copturus quadricinctus, Heller, Abhandl. Mus. Dresd. no. 11, p. 38¹.

Hab. MEXICO¹ (*Mus. Brit.*; *Mus. Dresden*), Toxpan in Vera Cruz (*Sallé*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

We have several specimens of this species from Eastern Mexico and Chiriqui. It has three vittæ on the prothorax, and the suture and two curved fasciæ on the elytra, ochreous or whitish. The elytral interstices are sharply costate throughout. The femora have each a small tooth; the carina on the outer face of the two posterior pairs is sharply defined. The metasternum is slightly depressed between the middle coxæ.

25. **Copturus ludiosus.** (Tab. V. figg. 26, 26 a.)

Copturus ludiosus, Boh. in Schönh. Gen. Curc. iv. p. 642¹; Heller, Abhandl. Mus. Dresd. no. 11, p. 30².

Hab. MEXICO, Vera Cruz² (*Chevrolat*¹), Teapa (*H. H. Smith*); PANAMA, Bugaba, (*Champion*).

We have two specimens of this species, agreeing with the type communicated by Dr. Aurivillius. The coarse punctuation of the prothorax, the rough elytral interstices, and the rather short, stout legs separate *C. ludiosus* from most of its Central-American allies. The prothorax has three faint interrupted ochreous vittæ on the disc, and the elytra a twice-interrupted white sutural stripe and two irregular transverse ochreous fasciæ, one basal and the other median. The second joint of the funiculus is as long as the third and fourth united, these being equal in length. The mesosternum is slightly depressed in the middle.

26. **Copturus gracilis.** (Tab. V. figg. 27, 27 a.)

Copturus gracilis, Heller, Abhandl. Mus. Dresd. no. 11, p. 37¹.

Elliptic, nigro-piceous, the rostrum rufescent, the antennæ and the apical margin of the elytra ferruginous; variegated above with narrow white, ochreous, and blackish scales, the white or ochreous scales condensed into a narrow line around the eyes and five narrow vittæ on the prothorax (the outer ones not visible from above), the elytra with a sutural stripe (which is interrupted beyond the middle in one specimen), and two transverse fasciæ at the sides, white, the disc also interruptedly bifasciate, the anterior fascia more or less ochreous; the vestiture of the legs and under surface white, the mesothoracic episterna with a fuscous spot, the fifth ventral segment with a transverse darker patch in the middle. Eyes very large, narrowly separated. Rostrum rugulose and sharply carinate at the base. Joint 2 of the funiculus very elongate, about as long as 3-6 united, 3 shorter than 1, 4 twice the length of 3, 5-7 transverse. Prothorax transverse, gradually narrowing from a little before the base, constricted in front, with broadly rounded ocular lobes; closely, coarsely punctate. Elytra much broader than the prothorax, somewhat rounded at the sides; rather coarsely punctate-striate, the interstices almost flat and densely rugulose. Meso- and metasternum slightly depressed between the middle coxæ. Legs moderately long; femora unidentate, the posterior pair extending a little beyond the apex of the abdomen, the knees acute.

Length $4\frac{1}{3}$ - $4\frac{3}{4}$, breadth $2\frac{1}{3}$ - $2\frac{1}{2}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*¹).

Very like *C. ludiosus*, but less rugose above and with the vestiture somewhat differently arranged, the fourth joint of the funiculus twice the length of the third (as in *C. fulvomaculatus*), the legs longer and not so stout, the rostrum more slender. I have seen three specimens of *C. gracilis*, including the type.

27. *Copturus histricus*, sp. n. (Tab. V. fig. 28.)

Subelliptic, nigro-piceous, the antennæ and rostrum ferruginous, the legs partly rufescent; variegated above with narrow ochreous, cinereous, and blackish scales, the ochreous scales clustered into a line around the eyes and three rather broad sharply-defined vittæ on the prothorax, the elytra with a small spot on the shoulder, two common, curved, interrupted fasciæ (one median and the other midway between it and the apex), and the apical portion of the suture, ochreous, the rest of the suture (except for a short distance before the middle) and various short streaks at the base of the dorsal interstices whitish; the vestiture of the under surface and legs white or yellowish-white. Eyes very large, subcontiguous. Rostrum rugulose and carinate at the base. Funiculus slender, joint 2 elongate, about as long as 3 and 4 united, these subequal in length and each as long as 1, 5-7 short. Prothorax transverse, constricted in front, narrowing from near the base, the sides rounded posteriorly; densely, somewhat finely punctate, and subcarinate. Elytra rather narrow, depressed along the suture, blunt at the tip; punctate-striate, the interstices almost flat. Meso- and metasternum flattened between the middle coxæ. Legs comparatively slender, moderately long; femora sharply unidentate, the posterior pair reaching to a little beyond the apex of the abdomen, carinate externally.

Length $4\frac{1}{8}$ - $4\frac{1}{3}$, breadth 2 millim.

Hab. PANAMA, Bugaba (*Champion*).

Two specimens, varying in the extent of the ochreous markings on the elytra. Less robust than *C. ludiosus*, the ochreous vittæ on the prothorax sharply defined, the elytral vestiture differently arranged, the sculpture of the prothorax and elytra not nearly so coarse, the legs more slender, &c.

28. *Copturus amœnus*, sp. n. (Tab. V. fig. 29.)

Copturus amœnus, Faust, in litt.

Oblong-elliptic, opaque, piceous, the antennæ and the apical margin of the elytra ferruginous; the vestiture fine, close on the elytra: the head with a line around the eyes, and the prothorax with three vittæ, fulvous; the elytra variegate with fulvous, cinereous, and blackish-brown—the cinereous scales condensed into two patches on the suture (one at the base, oblong, the other beyond the middle, transverse or triangular), the second usually extending along it to the tip, and various scattered spots, the fulvous scales mainly clustered into a spot on the shoulder, an oblique or transverse stripe below it, and a broad, interrupted, subapical fascia; the under surface thickly clothed with coarser white scales, the vestiture of the legs also white. Eyes very large, narrowly separated. Rostrum rugulose punctate at the base. Joint 2 of the funiculus elongate, as long as 3 and 4 united, the latter equal in length, 5-7 short. Prothorax short, somewhat rounded at the sides, constricted and slightly narrowed in front; densely, rugulose punctate, and obsolete carinate. Elytra narrowing from a little below the base, conjointly rounded at the apex; punctate-striate, the interstices rugulose and almost flat. Meso- and metasternum flattened between the middle coxæ. Legs slender, rather long; femora unidentate, the intermediate and posterior pairs carinate externally, the posterior pair scarcely reaching beyond the apex of the abdomen.

Length 3-4, breadth $1\frac{1}{3}$ - $1\frac{7}{8}$ millim.

Hab. MEXICO (*Koltze, in Mus. Dresden*); GUATEMALA, San Juan in Vera Paz (*Champion*).

Numerous specimens of this species were found at San Juan, on the north side of the Polochic Valley. Smaller and less robust than *C. histricus*, the elytral markings different.

29. *Copturus fulvocruciatu*s, sp. n. (Tab. V. fig. 30.)

Oblong-elliptic, dull, nigro-piceous or black, the antennæ ferruginous; the vestiture fine, coarser and somewhat imbricate on the cruciform elytral patch; the head with a line around the eyes, and the prothorax with three vittæ (the median one interrupted, the others excised within), ochreous or fulvous, the elytra with a broad, common, cruciform, fulvous and white patch on the apical half, an oblong, subquadrate, white patch at the base of the suture, a fulvous spot on the shoulder, and a few other scattered fulvous and white scales, the rest of their vestiture black; the under surface thickly clothed with coarse, oval, white scales, the lateral portions with a few ochreous scales intermixed, the vestiture of the legs white, the femora sometimes with ochreous scales intermixed. Eyes very large, subcontiguous. Rostrum rugulosely punctate and carinate at the base. Joint 2 of the funiculus elongate, nearly as long as 3-6 united, 3 and 4 subequal in length, 5-7 short. Prothorax short, densely, rugulosely punctate. Elytra depressed along the suture, punctate-striate, the interstices rugulose and feebly convex. Meso- and metasternum flattened between the middle coxæ. Legs short; femora sharply unidentate, the intermediate and posterior pairs carinate externally.

Length 3-3½, breadth 1½-1⅔ millim.

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*); PANAMA, Bugaba (*Champion*).

Twelve specimens. Near *C. amœnus*, but with a broad, common, cruciform, fulvous and white patch (the transverse portion fulvous, the sutural portion white in front and behind) on the apical half of the elytra, the white patch at the base of the suture larger, the legs shorter and stouter, &c. In one example the prothoracic vittæ are partly white.

30. *Copturus multiguttatus*, sp. n. (Tab. V. fig. 31.)

Subelliptic, rather short, nigro-piceous or piceous, the rostrum, antennæ, and tarsi, and the apical margin of the elytra, more or less ferruginous; the vestiture fine, close on the elytra: the head with a line around the eyes, and the prothorax with three vittæ (the central one dilated at the middle, the others curved), flavo-cinereous, the elytra with the suture, three irregular fasciæ (at base, middle, and apex), and various transverse spots or streaks, similarly coloured, the scales on the rest of their surface blackish-brown; the under surface thickly clothed with coarser whitish scales, the vestiture of the legs also white. Eyes very large, subcontiguous. Rostrum rugulosely punctate and carinate at the base. Joint 2 of the funiculus as long as 3-5 united, 4 much shorter than 3, 5-7 transverse. Prothorax short, somewhat rounded at the sides posteriorly, narrowed and feebly constricted in front; densely, rugulosely punctate, and feebly carinate. Elytra rather short, deeply striate, the striæ feebly punctate, the interstices rugulose and almost flat. Meso- and metasternum flattened between the middle coxæ. Legs short; femora rather stout, unidentate, the posterior pair carinate externally.

Length 2¼-3½, breadth 1⅔-1¾ millim.

Hab. PANAMA, Bugaba (*Champion*).

Eleven specimens. Smaller than *C. maculosus*, the fourth joint of the funiculus much shorter than the third, the elytra shorter, deeply striate, with the suture, three irregular transverse fasciæ, and various other spots and markings, which are here and there confluent, flavo-cinereous.

31. *Copturus gracilipes*, sp. n. (Tab. V. fig. 32.)

Subelliptic, rather narrow, nigro-piceous, the rostrum, antennæ, legs, and apical margin of the elytra rufo-testaceous or ferruginous; the vestiture fine: the head with a white line between the eyes, the prothorax with three ochreous vittæ, the elytra with a spot on the shoulder, a sutural stripe (which is interrupted by a dark spot beyond the middle), and various interrupted, transverse or undulate, fasciæ whitish, the rest of their vestiture blackish-brown; the under surface thickly clothed with white scales, the vestiture of the legs also white. Eyes very large, subcontiguous. Rostrum rugulose, carinate, and densely squamose at the base, and smooth and bare thence to the tip. Joint 2 of the funiculus as long as 3-5 united, 3 and 4 subequal in length, 5-7 short. Prethorax short, rounded at the sides, narrowed and constricted in front; densely punctate and subcarinate. Elytra punctate-striate, the interstices flat and rugulose. Mesosternum slightly hollowed, and the metasternum flattened, between the middle coxæ. Legs very slender; femora feebly unidentate, the posterior pair reaching the apex of the abdomen and carinate externally.

Length $2\frac{2}{5}$, breadth $1\frac{1}{10}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. A small species, with very slender red legs and whitish, interrupted, undulate fasciæ on the elytra, the latter also with a whitish sutural stripe, interrupted beyond the middle by a dark spot. It is perhaps nearest allied to *C. multiguttatus*.

32. *Copturus bicinctus*, sp. n. (Tab. V. fig. 33.)

Subelliptic, reddish-brown, the antennæ, rostrum, and tarsi, and the apical margin of the elytra, more or less ferruginous; the vestiture fine: the head with a line around the eyes, and the prothorax with three sharply-defined vittæ, ochraceous, the elytra with the suture, two rather broad fasciæ (one, basal, including the humeral callus, the other, undulate, beyond the middle), and a narrow streak at the apex of the seventh interstice, ochraceous or cinereous, the rest of the clothing of the upper surface brown, that of the under surface and legs whitish. Eyes large, almost contiguous. Rostrum rugulose and finely carinate at the base. Joint 2 of the funiculus nearly as long as 3-5 united, 3 and 4 equal in length, 5-7 very short. Prethorax short, narrowing from near the base, constricted in front; densely punctate and subcarinate. Elytra somewhat rounded at the sides, blunt at the apex, depressed along the suture; sharply striate, the striæ with fine punctures, the interstices almost flat and rugulose. Meso- and metasternum depressed between the middle coxæ. Legs short; femora unidentate, the posterior pair without external carina.

Length $2\frac{2}{3}$ - $3\frac{1}{3}$, breadth $1\frac{1}{3}$ - $1\frac{2}{3}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Four specimens. A small species with trivittate prothorax and bifasciate elytra, the latter with the suture and a narrow streak at the apex of the seventh interstice also ochraceous or cinereous.

33. *Copturus undatus*, sp. n.

Elliptic, piceous, the elytra mottled with rufo-piceous, the antennæ and tarsi ferrugineous, the rostrum, femora, and tibiæ reddish; the vestiture rather sparse, ochreous and white intermixed, the elytra also with darker scales: the pallid scales on the prothorax condensed into three broad vittæ (the central one interrupted); the elytra with various interrupted, undulate, irregular, light and dark fasciæ, the suture pale, each of the seriate punctures bearing a narrow scale; the vestiture of the under surface and legs whitish. Head broad; eyes very large, subcontiguous; rostrum rugulose and subcarinate at the base; joint 2 of the funiculus elongate. Prothorax short, gradually narrowing from the base, constricted in

front; densely punctate and feebly carinate. Elytra deeply punctate-striate, the striæ broad, the interstices rugose. Meso- and metasternum flattened between the middle coxæ. Legs short, femora feebly unidentate beneath, the posterior pair carinate externally.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Near *C. bicinctus*, but with a broader head and prothorax, the median vitta on the latter wider and interrupted, the elytra with undulate, irregular, light and dark fasciæ, the mesosternum unimpressed, the posterior femora carinate externally. The elytra have broader striæ than *C. multiguttatus*, and each of the punctures bears a narrow scale; the fasciæ, too, are more interrupted.

34. *Copturus fulvosignatus*, sp. n. (Tab. VI. fig. 1.)

Subelliptic, robust, piceous, sparsely clothed with narrow, intermixed whitish and fulvous scales, which are not clustered into vittæ on the prothorax, the fulvous scales on the elytra condensed into a transverse fascia on the disc below the base, the whitish scales condensed into a large subtriangular scutellar patch, an undulate postmedian fascia, and a narrow sutural stripe, the seriate punctures each with a narrow scale, the rest of their surface with scattered blackish-brown scales; the under surface clothed with coarse whitish scales, the vestiture of the legs similarly coloured. Eyes very large, narrowly separated. Rostrum rugulosely punctate and carinate at the base. Joints 1 and 2 of the funiculus subequal in length, 3 and 4 short, equal, 5-7 transverse. Prothorax broader than long, somewhat convex, subconical, very feebly constricted in front; closely, rather coarsely punctate, the narrow interspaces shining. Elytra rather short, rapidly narrowing from a little below the base, blunt at the apex; deeply punctate-striate, the interstices densely rugulose and almost flat. Meso- and metasternum broadly flattened between the middle coxæ. Legs short and stout; femora broad at the base, the intermediate and posterior pairs sharply unidentate, the anterior pair unarmed, the posterior knees acute.

Length $3\frac{1}{10}$ -4, breadth $1\frac{3}{4}$ -2 millim.

Hab. GUATEMALA, Chacoj in the Polochic Valley (*Champion*).

Five specimens. A small, robust species, with the vestiture of the prothorax sparse and scattered, the elytra with a transverse fulvous patch on the disc below the base and a common, undulate, whitish post-median fascia, the legs short and stout, the anterior femora unarmed, the second joint of the funiculus scarcely longer than the first. *C. fulvosignatus* has the antennæ formed very much as in *Damurus*.

35. *Copturus ignicollis*, sp. n. (Tab. VI. fig. 2.)

Subelliptic, black, the base of the antennæ ferruginous; rather sparsely clothed with narrow hair-like scales, which are seriatly arranged on the elytra: the head with a rufous line around the eyes above; the prothorax with three white patches at the base extending forwards to the broad fiery-red apical band; the elytra fulvous, with a transverse space at the base, a transverse patch on the suture before the middle, and a large patch at the apex, black and almost bare, the rest of the suture and the basal margin narrowly white, the seriate punctures each with a white hair-like scale; the under surface clothed throughout with coarser white scales, the metathoracic episterna with a line of fulvous scales along their inner edge, the vestiture of the legs white. Eyes very narrowly separated. Rostrum comparatively short, rugulosely punctate and carinate at the base. Joint 2 of the funiculus very little longer than 1, 3-7 short. Prothorax transverse, gradually narrowed in front; densely, rather coarsely punctate, and obsolete carinate. Elytra deeply punctate-striate, the interstices rugose and somewhat convex. Mesosternum with a

flattened prominence on each side, between the coxæ, hollowed down the middle. Legs short; femora unidentate, the intermediate and posterior pairs carinate externally.
Length $2\frac{1}{2}$ -3, breadth $1\frac{1}{4}$ - $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Four specimens. Smaller than *C. cincticollis*, the prothorax without an oblique white streak on the flanks, the elytral vestiture seriatly arranged, the markings different, the under surface without transverse black spaces at the sides, the rostrum less elongate, the joints 2-4 of the funiculus much shorter, the mesosternum with a flattened prominence on each side.

36. *Copturus albidus*, sp. n. (Tab. VI. fig. 3.)

Elliptic, black, the antennæ and tarsi fusco-ferruginous; densely clothed above and beneath with white scales, the scales on the upper surface fine, the elytra each with an indeterminate, rounded, blackish patch on the disc towards the apex, a small spot on the humeral callus bare. Eyes extremely large, very narrowly separated. Rostrum strongly arcuate, rugose and carinate at the base. Joint 2 of the funiculus nearly as long as 3-7 united, 3 and 4 equal in length, 5 short, 6 and 7 transverse. Prothorax short, narrowing from the base, feebly constricted in front, with broadly rounded ocular lobes; densely, finely punctate. Elytra depressed along the suture anteriorly, finely punctate-striate, the interstices broad, flat, and densely punctulate. Mesosternum flattened anteriorly, with a stout angular prominence on each side between the middle coxæ. Metasternum with a smooth, deep, foveiform impression in front, limited posteriorly by a short curved ridge. Legs short; femora linear, unidentate beneath, the intermediate and posterior pairs finely carinate externally.
Length $4\frac{2}{3}$, breadth $2\frac{2}{5}$ millim.

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two specimens. This insect has the meso- and metasternum formed as in *C. (Cyphocopturus) tristis*, Heller, but the legs are much more slender, and the femora are not widened at the base. The dense white vestiture of the entire surface, a darker patch near the apex of each elytron excepted, separates *C. albidus* from all the other forms here described. The tip of the rostrum is received in a deep foveiform cavity in the mesosternum, much as in many *Lechriops*.

The following species differ in various respects from the typical members of the genus *Copturus*, but they can remain under it for the present:—

37. *Copturus furfuraceus*. (Tab. VI. figg. 4, 4 a.)

Pæcilma furfuraceum, Germ. Ins. Spec. Nov. p. 260¹.

Zygops furfuraceus, Schönh. Gen. Curc. iv. p. 623².

Copturus furfuraceus, Boh. in Schönh. Gen. Curc. vi. 2, p. 101³.

Hoplocopturus furfuraceus, Heller, Abhandl. Mus. Dresd. no. 11, p. 50⁴.

Rhomboidal, flattened above, shining, black, the antennæ ferruginous; the vestiture rather close: the head with a line around the eyes (abraded above), the basal half of the rostrum, and the prothorax with the sides broadly and a narrow faint median vitta, fulvous, the rest of its disc black; the elytra black, with

three oblong spots on the suture (at the base, middle, and apex), and a spot on the eighth interstice beyond the middle, white, and a spot on the shoulder, another near the scutellum, and several smaller ones scattered over the disc, fulvous; the flanks of the prothorax clothed with ochreous, and the rest of the under surface with scattered white, scales, a broad space down the middle of the first ventral segment, and the anterior half of the second, bare, the white scales on each of the following two segments condensed into two transverse spots; the vestiture of the anterior legs fulvous, whitish at the base, that of the others in part white, the posterior pair black in their outer half. Eyes moderately large, subcontiguous above, acuminate below. Rostrum rugulose and feebly tricarinate in its basal half and finely punctate thence to the apex. Antennæ with an ovate club, its first joint barely as long as the others united; joint 2 of the funiculus about as long as 3-7 united, 3 and 4 short, subequal in length, 5-7 transverse. Prothorax transverse, conical; closely, rather coarsely punctate, and also carinate. Elytra subtriangular, rounded at the sides anteriorly, obliquely truncate at the apex, depressed along the suture; punctate-striate, the interstices thickly punctate and rather convex. Mesosternum vertical, excavate, the depression limited on each side by an oblique ridge. Metasternum triangularly depressed between the middle coxæ. Legs rather short; femora unidentate, the posterior pair barely reaching the apex of the abdomen, and (like the intermediate pair) carinate externally; intermediate and posterior knees with a long sharp spine, the anterior knees with a shorter spine.

Length $5\frac{1}{2}$, breadth 3 millim.

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).—BRAZIL ^{1 2 3}, Rio Janeiro and Espirito Santo (*coll. Fry*).

One specimen, in very fresh condition. The identification of this species is somewhat doubtful, Boheman not mentioning the three short white streaks on the suture, &c. I have seen, however, various examples from Brazil agreeing very nearly with the Chiriqui insect, from which the above description is taken.

38. *Copturus latitarsis*, sp. n.

Subelliptic, short, black, the antennæ, rostrum, and legs, a very large, broad, heart-shaped, common patch on the disc of the elytra (extending from about the basal third to near the tip), and their apical margin, ferruginous; the elytra with a few coarse white scales around the scutellum and a piliform whitish scale in each of the seriate punctures (the rest of the vestiture of the upper surface abraded); the under surface clothed with coarse white scales, the vestiture of the legs also white. Eyes large, almost contiguous in front, separated above by a narrow lanceiform space. Rostrum rather slender, widened, rugulose, and carinate at the base. Joint 2 of the funiculus a little longer than 1. Prothorax transverse, rounded at the sides, narrowed and constricted in front; densely, rather coarsely punctate, and finely carinate. Elytra short, somewhat rounded at the sides; deeply punctate-striate, the interstices not wider than the striae, rugulose. Meso- and metasternum flattened between the middle coxæ. Ventral segments gradually ascending, 2 not longer than 3 and 4 united, 1 depressed down the middle. Legs short and stout; femora with a minute tooth beneath; tarsi broad, the claws minute.

Length 2, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. GUATEMALA, Cahabon in Vera Paz (*Champion*).

One worn example, differing from all its allies in the short, stout, ferruginous legs, with rather broad tarsi; the elytra with broad striae, the femora each with a very minute tooth, the ventral segments gradually ascending, the second comparatively short. *C. latitarsis* will doubtless have to be removed from the genus *Copturus* when more specimens are available for examination.

ZURUS.

Zurus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 5 (1895); Tijdschr. voor Ent. xl. p. 199 (1897).

This genus includes various Tropical-American forms, four occurring within our limits. They are easily recognizable by the angularly produced basal lobe of the prothorax, which fills the scutellar cavity (the scutellum itself not being visible), the deeply excavate horseshoe-shaped mesosternum, and the equally unidentate femora. The Central-American species may be separated thus:—

Joint 2 of the funiculus much longer than 1.

Prothorax with a red collar in front, the posterior lobe ochreo-trivittate;

elytra without definite markings *sanguinicollis*, sp. n.

Prothorax red, with a transverse black patch on the disc; elytra with

large red patches *coccinatus*, sp. n.

Joint 2 of the funiculus not longer than 1; prothorax red, with a transverse black patch on the disc.

Elytra with longitudinal red stripes and patches *maculicollis*, sp. n.

Elytra with four large white spots *aurivillianus*, Heller.

1. *Zurus sanguinicollis*, sp. n. (Tab. VI. figg. 5, 5 a.)

Elliptic, black, the antennæ ferruginous, the vestiture rather coarse: the head with an ochreous line around the eyes above, the sides vermilion-red; the prothorax with three vittæ on the posterior half of the disc and three spots at the sides (the outer two scarcely visible from above) pale ochreous, the anterior portion vermilion-red; the elytra rather sparsely clothed with small narrow ochreous and white scales, which are condensed into short streaks and spots towards the base, the seriate punctures each bearing a white scale; the under surface clothed in part with coarse white scales, the ventral segments 1 and 2 with two bare black stripes, which extend outwards along the apical portion of each segment. Eyes almost contiguous in front. Joint 2 of the funiculus elongate, much longer than 1. Prothorax transverse, rounded at the sides, narrowed and strongly constricted in front; coarsely, densely punctate, and subcarinate. Elytra cordate, broadly flattened on the disc, the outer apical portion depressed and obliquely truncate, the apex itself sinuato-truncate, the humeri swollen, bare, and shining, the base sharply margined; punctate-striate, the interstices densely rugose. Femora sharply unidentate, the posterior pair acutely produced at the apex.

Length $5\frac{1}{2}$, breadth $3\frac{1}{10}$ millim.

Hab. HONDURAS (*Mus. Brit.*).

One specimen, received at the British Museum in 1845. This insect has the prothorax coloured very much as in *Copturus tricolor*, from which it is easily separable by the more rugose sculpture, the shorter, cordate elytra, the non-visible scutellum, &c.

2. *Zurus coccinatus*, sp. n. (Tab. VI. figg. 6, 6 a.)

Broad, rhomboidal, shining, black, the antennæ ferruginous; the sides of the head, the prothorax (a transverse patch on the disc behind and the basal margin excepted), a large, common, subtriangular patch on the basal half of the suture of the elytra (extending outwards to the third row of punctures), a curved mark at the apex, and a large spot on the outer part of the disc at about the middle, vermilion-red, the prothorax with a row of narrow pale brownish scales along the basal margin; the base of the rostrum, the anterior portion of the prosternum, the mesothoracic epimera, the metasternum, the ventral segments

1 (except at the sides in front) and 2, and a spot on each side of 5, clothed with coarse white scales; the rest of the upper and under surfaces bare or with scattered fine, narrow, dark scales; the vestiture of the legs whitish. Eyes almost contiguous in front. Joint 2 of the funiculus as long as 3 and 4 united. Prothorax short, rather convex, narrowing from the base, constricted in front; closely, coarsely punctate, and subearinate. Elytra broad, subeordate, broadly flattened on the disc, sharply margined at the base; punctate-striate, the interstices rugose. Beneath closely punctate, the mesothoracic episterna bare and almost smooth. Femora sharply unidentate.

Length $4\frac{1}{3}$ – $4\frac{1}{2}$, breadth $2\frac{1}{2}$ millim.

Hab. NICARAGUA, Chontales (*Belt*).

Two specimens. Distinguishable by its rhomboidal form and the vermilion-red markings. The elytral spots are placed very much as in *Z. aurivillianus*, but the apical one is strongly curved.

3. *Zurus maculicollis*, sp. n. (Tab. VI. fig. 7.)

Subelliptic, black, the antennæ ferruginous; the head with a line of fulvous scales around the eyes above, the prothorax vermilion-red, with a transverse black patch on the middle of the disc, the elytra with a sinuous stripe on each side of the suture (the stripes becoming coalescent towards the base and apex) and a large, elongate, anteriorly attenuate patch at the sides, vermilion-red; the vestiture of the legs and under surface white or yellowish-white, a patch on the flanks of the prothorax and another in the middle of the ventral segments 3 and 4 sparsely squamose or almost bare. Eyes almost contiguous in front. Joint 2 of the funiculus scarcely so long as 1. Prothorax transverse, rather convex, narrowing from near the base; densely punctate and subearinate. Elytra subeordate, flattened on the disc; deeply punctate-striate, the interstices rugose. Femora unidentate. Ventral segment 1 broadly depressed down the middle, and 5 sharply, narrowly sulcate, and pilose at the tip, in the ♂.

Length 3 – $3\frac{1}{4}$, breadth $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

One pair. Near *Z. aurivillianus*, but with the elytral markings red and in the form of longitudinal stripes or patches. *Z. besckei* (Boh.) is another allied form, with transverse red fascia on the elytra.

4. *Zurus aurivillianus*. (Tab. VI. fig. 8.)

Zurus aurivillianus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 6, 9¹.

Copturus quadrimaculatus, Jekel, in litt.²

Hab. MEXICO, Guadalajara (*Flohr*), Amula (*H. H. Smith*).—COLOMBIA (*Mus. Brit.*); VENEZUELA¹; BRAZIL¹.

Four specimens of this widely-distributed Tropical-American insect have been received by us from Mexico. It is easily known by the red vestiture of the prothorax, with a transverse black patch of variable extent on the disc, and the four large white spots on the elytra, the vertex and humeri often with a small white spot, the metasternum and first two ventral segments in great part white, the other segments black with the sides white. The second joint of the funiculus is scarcely so long as the first. I have seen one of the types from Caracas.

MICROZURUS.

Microzurus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 13 (1895).

Microzurus is based upon a single species from Bahia, which also occurs within our limits. It differs from *Zurus* in having very minute tarsal claws, the posterior femora only dentate, &c. Two small forms are now added, one with a very shallow mesosternal depression, a short, feebly convex prothorax, &c., and the other with unarmed posterior femora and a flattened mesosternum.

1. ***Microzurus rhombus*.** (Tab. VI. figg. 9, 9 a.)

Microzurus rhombus, Heller, Abhandl. Mus. Dresd. no. 11, p. 13, fig. 31 (antenna) ¹.

Hab. MEXICO, Cerro de Plumas, Atlantic slope (*Höge*).—BRAZIL, Bahia ¹.

One specimen. I have not seen either of the types, but the Mexican insect agrees fairly well with the description, except in its smaller size (length $2\frac{1}{2}$ millim.). The elytra have the apical half of the suture densely clothed with whitish scales.

2. ***Microzurus trinotatus*, sp. n.** (Tab. VI. figg. 10, 10 a.)

Rhomboidal, shining, black, the apical margin of the elytra and the tarsi ferruginous; the elytra with a spot on each side of the scutellum and another on the suture beyond the middle, this latter extending down the suture to the tip and continued along the apical margin, densely clothed with rather coarse white scales, the lower part of the head, the basal half of the rostrum, and the flanks of the prothorax also somewhat thickly, and the rest of the under surface and the legs sparsely, albo-squamosae. Eyes narrowly separated above, subcontiguous in front, the infra-ocular portion of the head broad and flattened. Rostrum strongly arcuate, rather stout, rugulose and carinate at the base, the apical half almost smooth. Joint 2 of the funiculus much shorter than 1. Prothorax about twice as broad as long, narrowing from the base, somewhat convex, the median lobe narrow; coarsely, closely punctate, without trace of median carina. Elytra cordate, convex, much wider than the prothorax; deeply punctate-striate, the interstices smooth and sharply costate. Mesosternum with the oblique lateral laminae feebly developed, the broad intervening space slightly depressed. Legs short; femora sulcate beneath, the posterior pair only dentate, finely carinate externally; tarsi moderately stout, the claws very minute.

Length $1\frac{1}{2}$, breadth 1 millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen.

3. ***Microzurus edentatus*, sp. n.** (Tab. VI. figg. 11, 11 a.)

Rhomboidal, convex, black, the elytra mottled with ferruginous, the head, rostrum, antennae, knees, tibiae, and tarsi similarly coloured; variegated above with small, narrow, scattered, ochreous, whitish, and black scales, the ochreous and whitish scales condensed into a short streak at each hind angle of the prothorax, and an interrupted ante-median fascia and an apical patch on the elytra, the vestiture of the legs and under surface entirely pale. Eyes rather small, oval, contiguous. Rostrum moderately stout, feebly curved, slightly widened towards the tip, thickly punctate, except along the smooth median line. Joint 2 of the funiculus shorter than 1. Prothorax convex, transverse, narrowing from the deeply sinuate base, feebly constricted in front; densely, finely punctate, and also carinate. Scutellum minute, depressed, hidden by the median lobe of the prothorax. Elytra transversely convex, broad, cordate, blunt at the tip; punctate-striate, the interstices narrowly costate. Mesosternum transversely depressed, without

trace of laminae. Intercoxal portion of the metasternum very broad, flattened, declivous in front. Legs short and stout; femora unarmed, the anterior pair subclavate; third tarsal joint broadly bilobed, the claws very minute.

Length $1\frac{1}{2}$, breadth $1\frac{1}{10}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen, with the prothorax slightly malformed on the right side.

PSEUDOLECHRIOPS, gen. nov.

Head with the eyes about as broad as the prothorax, the eyes large and separated in front by rather more than the width of the smooth apical portion of the rostrum; rostrum as long as the head and prothorax, flattened, almost straight, widened at the base, the antennae inserted behind the middle, joint 2 of the funiculus much longer than 1, joint 1 of the club as long as the others united; prothorax short, subcylindrical, deeply sinuate at the base, without ocular lobes; scutellum convex, exposed; elytra broad, subcordate; pygidium not visible; mesothoracic epimera narrowly ascending; rostral canal deep, reaching as far as the apical margin of the middle coxae, the walls complete; ventral segments rapidly ascending; legs moderately long; femora sharply unidentate, the posterior pair reaching a little beyond the apex of the abdomen, the intermediate and posterior pairs finely carinate externally, the knees unarmed; posterior tibiae broadly dilated to near the apex and abruptly narrowed thence to the tip; third tarsal joint bilobed, a little wider than the second, the claws divergent.

Type, *Ps. megacephalus*.

This genus approaches *Tachylechriops*, Heller, based on a single species from Cayenne, from which it differs in the broad head, the somewhat widely separated eyes, the almost straight, flattened rostrum, the short, subcylindrical prothorax, the less elongated hind legs, the broad, emarginate posterior tibiae, &c.* The form of the hind legs, the non-contiguous eyes, &c., distinguish *Pseudolechriops* from *Lechriops*.

1. *Pseudolechriops megacephalus*, sp. n. (Tab. VI. figg. 12, 12 a, b.)

Black, the antennae, tarsi, anterior tibiae, and outer half of the rostrum ferruginous (the prothorax and elytra rufescent in one specimen); the vestiture sparse and fine, ochreous and uniformly distributed on the head and prothorax; the elytra each with a broad oblique whitish fascia beyond the middle, a space along the suture thence to the base, and the base itself, clothed with fine ochreous hair-like scales, the rest of their vestiture sparser and darker, that of the under surface and legs white. Head densely, rugulosely punctate, hollowed between the eyes; rostrum rugulose at the base, shining, the outer half smooth. Prothorax transverse, scarcely widened at the base, constricted in front; densely punctate and obsoletely carinate. Elytra depressed along the suture anteriorly, sharply punctate-striate (the striae narrow, with oblong punctures), the interstices broad, rugulose, and almost flat.

Length $3\frac{1}{10}$ — $3\frac{1}{8}$, breadth $1\frac{2}{3}$ millim.

Hab. GUATEMALA, San Isidro and Pantaleon (*Champion*).

Two specimens, both from the "tierra caliente" of the Pacific slope, one of them slightly immature.

* In the Fry Collection at the British Museum there is an allied undescribed form from Brazil, but it could not be included in either of these genera.

LECHRIOPS.

Lechriops, Schönherr, Curc. Disp. Meth. p. 306 (1826); Gen. Curc. iv. p. 259; Lacordaire, Gen. Col. vii. p. 149; Heller, Abhandl. Mus. Dresd. no. 11, pp. 3, 14.
Gelus, Casey, Ann. N. York Acad. Sci. ix. pp. 667, 668 (1897).

Under this genus are included a large number of small forms closely related to *Copturus*, with the mesosternum, and often the intercoxal portion of the metasternum also (fig. 13 *b*), excavate for the reception of the rostrum; the femora unidentate, the anterior pair without strigose area, the posterior pair not reaching beyond the apex of the abdomen, and usually more or less distinctly carinate externally, the knees unarmed or feebly spined; and the second joint of the funiculus moderately elongate*, often not longer than the first. The numerous allied species with unarmed, non-carinate femora belong to *Eulechriops*, Faust, and are here placed under that generic name. The type of *Lechriops* is *Rhynchænus sciurus*, Fabr.†, a S.-American insect with a comparatively short rostrum and correspondingly short antennæ, and about twenty other forms are referred to the same genus by Dr. Heller (though none were described by him) in his important work on the American Zygopides. Upwards of thirty species are here recognized from within our limits, but some of these are so imperfectly segregated that it is almost impossible to separate them satisfactorily, as they differ only in the size, colour, and arrangement of the scales, characters that may prove to be more variable than is generally supposed.

The following table will assist in the identification of the Central-American forms:—

a. Rostral canal extending into the intercoxal portion of the metasternum.

- a*¹. Joint 2 of the funiculus as long as or longer than 1; elytral interstices wider than the striæ (except in *L. canescens*).
- a*². Prothorax hollowed at the apex, with broadly rounded ocular lobes; eyes very large; joint 4 of the funiculus longer than 3 in the ♀ . . . Species 1.
- b*². Prothorax less hollowed or truncate at the apex, without definite ocular lobes; joint 4 of the funiculus not longer than 3.
- a*³. Body oblong-ovate; elytra with a white spot on the suture, the alternate interstices rufescent Species 2.
- b*³. Body rhomboidal, ovate, or elliptic.
- a*⁴. Meso- and metasternal excavation shallow; vestiture of body coarse and white Species 3-5.
- b*⁴. Meso- and metasternal excavation deep.
- a*⁵. Elytral interstices almost smooth, the inner ones finely punctate, the striæ narrow, deep, and sharply cut; vestiture of body fine. Species 6.

* Except in *L. copturoides*.

† We are indebted to Dr. Aurivillius for the loan of the abraded example of this species in the Stockholm Museum.

- b*⁵. Elytral interstices rugose or punctate.
- a*⁶. Prothorax without whitish lateral stripe or spot, the elytra with or without a white spot at the middle of the suture . . . Species 7-30.
- b*⁶. Prothorax with a broad lateral stripe, or the entire flanks, and the elytra with a more or less distinct spot at the middle of the suture, white or pale ochreous Species 31-34.
- c*⁶. Prothorax with a broad lateral stripe, and the elytra with a spot on the shoulders and the apex, white Species 35.
- b*¹. Joint 2 of the funiculus shorter than 1; prothorax and elytra with white spots, the elytral interstices not wider than the striae Species 36.
- b*. Rostral canal not extending beyond the mesosternum; joint 2 of the funiculus much longer than 1 Species 37, 38.

1. *Lechriops copturoides*, sp. n. (Tab. VI. figg. 13, 13 *a-c*, ♀.)

Subovate, piceous or nigro-piceous, the antennæ, tarsi, and apical margin of the elytra ferruginous; the vestiture close, the scales on the elytra very small, oval, and somewhat imbricate: the whitish or pale ochreous scales on the prothorax condensed into three broad vittæ, and those of the elytra into a broad sutural stripe and two or more broad, transverse or oblique fasciæ, which are sometimes divided or much interrupted, the rest of the upper surface brownish or fuscous; the flanks of the prothorax and the under surface densely clothed with coarser whitish scales, the vestiture of the legs also whitish. Eyes very large, occupying the whole of the side of the head, subcontiguous. Rostrum rather slender, rugulose and subcarinate at the base. Joint 2 of the funiculus elongate, about as long as 3-5 united, 4 longer than 3 in the ♀, 5-7 transverse. Prothorax short, narrowing from the base, hollowed at the apex, and with broad prominent ocular lobes; densely, rugulosely punctate, and subcarinate. Elytra somewhat rounded at the sides, blunt at the tip, depressed along the suture; deeply punctate-striate, the striae narrow, the interstices broad, rugulose, and feebly convex. Rostral canal deep, the walls prominent, the cavity in the metasternum extending backward beneath the surface.

Length $2\frac{1}{2}$ - $3\frac{1}{4}$, breadth $1\frac{1}{3}$ - $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Toxпам in Vera Cruz (*Sallé*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Fifteen specimens, eight of which are from Chiriqui. This species is very like some of the smaller *Copturi*, but the rostral canal is so deeply excavate posteriorly that the rostrum can be completely locked in at the will of the insect. The fourth joint of the funiculus is slightly elongated in the female, as in *Copturus gracilis* and *C. fulvomaculatus*. The markings are variable, but there is always a transverse dark patch near the apex of each elytron.

2. *Lechriops oblongulus*, sp. n. (Tab. VI. fig. 14.)

Oblong, dull, black, the alternate elytral interstices rufescent, the apical half of the rostrum, the antennæ, tibiae, and tarsi ferruginous; the head with a line of fulvous scales around the eyes; the prothorax thickly clothed with rather long, coarse, fulvous scales, with a few white ones intermixed on the disc; the elytra with a small transverse white patch at the middle of the suture, a white dot in a line with it on the eighth interstice and another on the shoulder, and for the rest sparsely clothed with small, narrow, intermixed fulvous and cinereous scales; the vestiture of the under surface and legs similarly coloured. Head rather small; eyes moderately large, narrowly separated; rostrum rugulosely punctate and carinate at the base; joints 1 and 2 of the funiculus equal in length. Prothorax transverse,

gradually narrowing from about the basal third, constricted in front; densely, finely punctate, and also carinate. Elytra a little wider than the prothorax, rather long, bluntly rounded at the apex, the sutural region strongly depressed from the base to the middle; shallowly punctate-striate, the interstices flat and rugulose. Rostral canal reaching as far as the posterior margin of the middle coxæ, becoming shallow posteriorly. Femora dentate, the tooth on the anterior pair almost obsolete.

Length $3-3\frac{1}{2}$, breadth $1\frac{2}{5}-1\frac{1}{2}$ millim.

Hab. MEXICO, Ciudad in Durango (*Höge*).

Two specimens. Very like a Californian insect sent me by Mr. Wickham under the name of *Piazurus californicus*, Lec.*, but with the vestiture of the elytra finer and that of the prothorax almost entirely fulvous, the sutural depression much deeper, the alternate elytral interstices rufescent, and the rostral canal a little longer. Both species are rather elongate in shape.

3. *Lechriops albisquamis*, sp. n. (Tab. VI. figg. 15, 15 a.)

Subovate, robust, black, the antennæ and the tips of the tarsi obscure ferruginous; rather sparsely clothed with coarse, narrow, white scales, the prothorax with two small, elongate-triangular spaces on the disc, and the elytra with a narrow, irregular, angulate fascia below the base, a spot on the shoulder, another on the disc towards the apex, and a patch at the sides, almost bare, the seriate punctures of the elytra each with a narrow white scale; the posterior femora with a broad black patch at the middle. Head broad; eyes very large, narrowly separated; rostrum carinate and rugosely punctate at the base, very sparsely, finely punctate in its outer half; joint 2 of the funiculus a little longer than 1. Prothorax short, somewhat gibbous on the disc, gradually narrowing forwards, constricted in front, deeply bisinuate at the base; coarsely, closely punctate, and sharply arcuato-carinate. Elytra subcordate, truncate at the apex; deeply punctate-striate, the interstices a little wider than the striæ, flattened, and rugose. Mesosternal depression shallow, that of the metasternum small and foveiform. Legs short and stout; femora sharply unidentate; intermediate and posterior knees dentate.

Length $3\frac{1}{2}$, breadth 2 millim.

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*).

One specimen. *L. albisquamis* is one of those forms that are almost intermediate between *Copturus* and *Lechriops*, the mesosternal depression being shallow. The coarse white vestiture of the prothorax and elytra is somewhat evenly distributed; the bare spaces are small and inconspicuous.

4. *Lechriops canescens*, sp. n. (Tab. VI. fig. 16.)

Very near *L. albisquamis*, the vestiture a little finer; the prothorax with the two bare spaces on the disc larger, the elytra with a broad triangular space below the base (extending inwards to the second stria) and a large apical patch sparsely clothed with black or black and white scales (leaving the base, suture, and a broad oblique fascia beyond the middle white); the prothorax less convex on the disc and with the median carina not so prominent; the elytral interstices scarcely wider than the striæ; the legs more slender, the tooth on the anterior femora long and narrow; the meso- and metasternal excavations shallow.

Length $2\frac{7}{8}-3$, breadth $1\frac{3}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).—COLOMBIA (*Mus. Brit.*).

* Placed by Casey in his genus *Gelus*.

Three specimens from Bugaba and one from Colombia. This insect is the southern representative of the Guatemalan *L. albisquamis*, and requires a separate name. *L. canescens* is also very like *L. (Copturus) senex*, Pasc., from Parana, but is smaller and less robust, the prothorax is shorter, and the vestiture is not so coarse, the white scales forming definite markings on the elytra.

5. *Lechriops squamirostris*, sp. n. (Tab. VI. figg. 17, 17 a.)

Ovate, opaque, black, the antennæ, tarsi, and apical margin of the elytra ferruginous; somewhat thickly clothed with narrow white scales, which are subseriately arranged on the elytra, their eighth interstice with a small white spot beyond the middle, the prothorax with a few darker scales intermixed; the rostrum densely albo-squamose to near the tip; the under surface thickly clothed with coarse white scales, the vestiture of the legs also white. Head rather small; eyes subcontiguous, moderately large; rostrum rugulose and sharply carinate to near the tip; joint 2 of the funiculus as long as 3-5 united, 5-7 transverse. Prothorax short, rounded at the sides, narrowed and feebly constricted in front; closely punctate and feebly carinate. Scutellum small. Elytra subcordate; punctate-striate, the interstices rugulose and a little wider than the striæ. Meso- and metasternal depression shallow, the latter limited posteriorly by a v-shaped ridge.

Length 3, breadth $1\frac{2}{3}$ millim. (♂.)

Hab. BRITISH HONDURAS, Rio Hondo (*Blancaneaux*).

One specimen. In this species the rostrum is sharply carinate and densely squamose to near the tip; the vestiture of the upper surface is white and almost equally distributed; and the second joint of the funiculus is very much longer than the first.

6. *Lechriops exsculptus*, sp. n.

Subrhomboidal, shining, nigro-piceous, the antennæ, tibiae, tarsi, and apical margin of the elytra ferruginous; the vestiture very sparse, fine: the head with a line around the eyes, and the prothorax with three narrow vittæ on the disc and one on each flank, ochreous; the elytra with a short narrow streak at the middle of the suture, and a spot in a line with it on the eighth interstice, white, the rest of their surface with scattered ochreous and white hair-like scales; the under surface and legs white, the posterior femora with an almost bare space beyond the middle. Head with a fine carina on the vertex; eyes large, somewhat flattened in front, subcontiguous; rostrum rugulose and subcarinate at the base; joint 2 of the funiculus elongate, nearly as long as 3-5 united; antennal club stout, ovate. Prothorax short, conical; densely punctate, the punctures transversely confluent on the disc, the latter sharply arcuate-carinate. Scutellum smooth. Elytra broad, rounded-triangular, depressed along the suture, the humeri smooth and prominent; sharply, deeply striate, the striæ finely punctate, the dorsal interstices narrow, subcarinate on each side, and with fine scattered punctures, the outer interstices broad, smooth, and almost bare. Rostral canal deep, extending as far as the apical margin of the middle coxæ, the walls complete. Legs rather slender; femora sharply unidentate, the intermediate and posterior knees acute.

Length $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. A small species, with sharply carinate, short prothorax and subtriangular elytra, the latter with deeply-cut striæ and almost smooth outer interstices.

7. *Lechriops amplipennis*, sp. n. (Tab. VI. fig. 18.)

Subrhomboidal, shining, black, the antennæ, tarsi, and apical margin of the elytra ferruginous; sparsely clothed with very small, narrow, blackish and white scales, the latter condensed on the prothorax into a faint, interrupted median line and a spot near each angle, the white scales on the elytra entirely clustered into a few small spots and narrow streaks (one at the middle of the suture and another at its apex, a streak on the interstices 3 and 5, and a spot on 7 and 8); the vestiture of the under surface sparse, piliform, white, that of the legs also white, the posterior femora with a black patch beyond the middle. Head rather small; eyes almost contiguous, strongly acuminate below; rostrum rugulose and finely carinate at the base, the basal portion very little widened; joint 2 of the funiculus slightly longer than 1. Prothorax short, subconical; closely, finely punctate, and subcarinate. Elytra very much wider than the prothorax, subcordate, blunt at the apex, rather convex, the sutural region depressed anteriorly; deeply punctate-striate, the interstices wider than the striæ, punctulate, the outer ones rather convex. Rostral canal deep, extending a little beyond the mesosternum. First ventral segment shallowly sulcate down the middle. Legs short.

Length $2\frac{3}{8}$, breadth $1\frac{3}{8}$ millim. (♂?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. A peculiar little species, with a short, subconical, comparatively narrow prothorax, and broad, rather convex, subcordate elytra, the white scales on the shining upper surface wholly clustered into a few small scattered spots and narrow streaks, the rostrum very little widened at the base. It has the same general shape as *L. exsculptus*.

8. *Lechriops alboguttatus*, sp. n. (Tab. VI. fig. 19.)

Subovate, robust, shining, black, the antennæ, the apical margin of the elytra, and the tarsi in part, ferruginous; variegated with fine blackish and coarser white scales, the white scales on the prothorax condensed into eight spots (the one on each side at the base large, rounded or subquadrate, and the one on the anterior part of the flanks not visible from above), and those on the elytra into a transverse spot at about the middle of the suture, an oblong streak at its apex, and various scattered spots or more or less interrupted undulate fasciæ (the fascia extending from the base of the suture to below the humeri sometimes complete); the under surface (a transverse almost bare space on each side of the abdomen excepted) and legs also clothed with white scales, the posterior femora with a blackish annulus towards the apex. Eyes narrowly separated. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus considerably longer than 1. Prothorax transverse, narrowing almost from the base, constricted in front; densely, rather finely punctate, and feebly carinate. Elytra somewhat rounded at the sides, blunt at the apex, depressed along the suture anteriorly; deeply punctate-striate, the interstices rather broad, flat, and rugulose. Rostral canal deep, extending to the front of the metasternum. Femora sharply dentate.

Var.? Smaller, the prothorax with a narrower, oblong, whitish patch on each side at the base.

Length $3\frac{1}{2}$ –4, breadth 2 – $2\frac{1}{2}$ millim.

Hab. GUATEMALA, Sinanja and Purula in Alta Vera Paz (*Champion*).

Many specimens, all but one from Sinanja. The small form (length $2\frac{1}{2}$ –3 mm.) is represented by two specimens from Purula. Recognizable by the numerous well-defined white spots on both the prothorax and elytra, and by the rather finely punctured prothorax. The white scales are rather coarse.

9. *Lechriops rufomaculatus*, sp. n. (Tab. VI. fig. 20.)

Elliptic, rather long, shining, black, the antennæ (the club excepted), the apical half of the rostrum, a broad space at the base of the elytra (extending outwards to the humeri), their apical margin, and the legs in great part, reddish or ferruginous; the vestiture fine, sparse, that on the prothorax white and ochreous intermixed, clustered into three faint vittæ on the disc and various streaks on the flanks, that on the elytra ochreous, white, and black, the white scales clustered into a short streak at the middle of the suture, another at its apex, and a small spot on the eighth interstice, the ochreous scales condensed into various faint, interrupted, undulate fasciæ; the clothing of the legs and under surface sparse and fine, the posterior femora with a dark patch near the apex. Eyes very large, narrowly separated. Rostrum rugulose punctate and carinate to about the middle. Joint 2 of the funiculus distinctly longer than 1. Prothorax short, gradually narrowing from the base; densely, finely punctate, except along the slightly raised smooth median line. Elytra subcordate, blunt at the apex; deeply punctate-striate, the interstices punctulate, the outer ones rather convex. Rostral canal deep, extending as far as the posterior margin of the middle coxæ. Femora feebly dentate, the posterior pair about reaching the apex of the abdomen. Length $2\frac{3}{4}$ – $2\frac{9}{10}$, breadth $1\frac{2}{5}$ – $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens. Recognizable by the broad reddish patch at the base of the elytra, the fine vestiture (which is clustered into small spots and interrupted undulate fasciæ on the elytra), the very large eyes, and the feebly dentate femora.

10. *Lechriops rugicollis*, sp. n.

Subovate, robust, black, the antennæ, the tips of the tarsi, and sometimes the apex of the rostrum and the apical margin of the elytra also, ferruginous; the prothorax with scattered, fulvous and white, hair-like scales, which are clustered into patches at the sides and along the middle, the elytra variegated with small, narrow, intermixed fulvous, white, and black scales; the vestiture of the under surface and legs rather sparse, fine, white. Eyes large, very narrowly separated. Rostrum rugulose and sharply carinate at the base. Joint 2 of the funiculus elongate, about twice as long as 1. Prothorax transverse, rapidly narrowing from near the base, constricted in front; coarsely, rugosely punctate, except along the irregular, smooth, slightly raised median line, the punctures on the disc transversely confluent and those on the flanks separate one from another. Elytra subcordate, obliquely truncate at the tip, depressed along the suture anteriorly; punctate-striate, the striæ narrow, the interstices rugose, broad, and almost flat. Rostral canal rather broad and deep, the metasternal excavation triangular. First ventral segment slightly depressed down the middle in the ♂. Intermediate and posterior knees dentate. Length 4– $4\frac{1}{2}$, breadth $2\frac{1}{4}$ – $2\frac{1}{2}$ millim.

Hab. GUATEMALA, Panima in Vera Paz (*Champion*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Four specimens, the one from the Volcan de Chiriqui having the prothorax a little less rugose and the vestiture of the upper surface almost wholly black and white. This species is chiefly distinguished by the long second joint to the funiculus, the transversely rugose prothorax, and the rather fine vestiture, the elytra without definite white spot at the middle of the suture.

11. *Lechriops vicinus*, sp. n.

Elliptic, robust, shining, nigre-piceous, the elytra sometimes rufo-piceous, the antennæ, the apical margin of the elytra, and the tips of the tarsi ferruginous; the prothorax with scattered, narrow, ochreous scales, which are mostly clustered at the sides and down the middle; the elytra sparsely clothed with narrow,

intermixed ochreous, white, and blackish scales, the white scales condensed into a short streak at the middle of the suture and the ochreous ones into small scattered fascicles; the vestiture of the under surface coarse and whitish, that of the legs also white. Head rather small; eyes moderately large, subcontiguous; rostrum rugulose and sharply carinate at the base; joint 2 of the funiculus elongate, nearly as long as 3-6 united. Prothorax transverse, narrowing from the base; coarsely, rugosely punctate, except along the smooth, slightly raised, median line, the punctures on the flanks very coarse. Elytra deeply punctate-striate, the interstices rugose, flat. Rostral canal deep, the metasternal excavation triangular. First ventral segment depressed down the middle in the ♂. Intermediate and posterior knees acutely dentate.

Length $3\frac{1}{2}$, breadth $1\frac{4}{5}$ – $1\frac{9}{10}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Four specimens. Narrower than *L. rugicollis*, the eyes not so large, the elytral vestiture sparser, the ochreous scales clustered into small scattered fascicles, the striae deeper and broader, the under surface with larger scales.

12. *Lechriops nitidicollis*, sp. n. (Tab. VI. fig. 21.)

Subovate, shining, black or piceous, the antennae, the tips of the tarsi, and the apical margin of the elytra ferruginous; the prothorax sparsely clothed with long, narrow, fulvous and white scales, which are clustered into patches at the sides and along the middle; the elytra with coarse, narrow, intermixed white, fulvous, and blackish scales, the white scales clustered into various scattered patches; the vestiture of the under surface and legs rather sparse, white, sometimes in part fulvous, the posterior femora with a dark patch on their outer face. Eyes large, very narrowly separated. Rostrum carinate and rugulose at the base. Joint 2 of the funiculus elongate, much longer than 1. Prothorax short, narrowed from near the base, constricted in front; coarsely, closely punctate, except upon the raised median line, the narrow interspaces also smooth and shining. Elytra much wider than the prothorax, blunt at the apex; punctate-striate, the interstices rugose, the outer ones feebly, narrowly costate. Rostral canal deep, extending to the anterior portion of the metasternum. Intermediate and posterior knees acutely dentate.

Length $2\frac{3}{4}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ –2 millim.

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Panima in Vera Paz (*Champion*).

Seven specimens, all but one from Teapa. Shorter than *L. vicinus*, the vestiture of the upper surface much coarser, the white scales clustered into various patches on the elytra (the fulvous scales sometimes as numerous as the white ones, and sometimes almost wanting), the outer interstices narrowly costate.

13. *Lechriops albovariegatus*, sp. n. (Tab. VI. fig. 22.)

Subovate, black, the antennae, the apical margin of the elytra, and the tarsi wholly or in part, ferruginous; the vestiture fine, black and white intermixed, the scattered white scales on the prothorax condensed into six spots or three interrupted vittae on the disc and some irregular markings on the flanks, and those on the elytra into various interrupted undulate fasciae and a short faint streak at the middle of the suture, the latter sometimes wanting; the clothing of the under surface and legs sparse, fine, and white, the posterior femora with a dark patch towards the apex. Eyes large, very narrowly separated. Rostrum rugulose punctate and carinate at the base. Joint 2 of the funiculus distinctly longer than 1. Prothorax short, narrowed and constricted in front; densely punctate and feebly carinate. Elytra subcordate, blunt at the apex; deeply punctate-striate, the interstices rugose and almost flat. Rostral canal deep, reaching the anterior portion of the metasternum.

Length $2\frac{1}{3}$ – $3\frac{1}{5}$, breadth $1\frac{1}{4}$ –2 millim.

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Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Sinanja and Cachil in Vera Paz (*Champion*).

Five specimens, the description being taken from the three from Sinanja. Shorter than *L. alboguttatus*, the white scales narrower and more scattered, and not clustered into sharply-defined spots. The vestiture is fine, above and beneath, and almost wholly white and black.

14. *Lechriops excavatus*, sp. n. (Tab. VI. fig. 23.)

Subovate, nigro-piceous or black, rather dull, the antennæ, the apical margin of the elytra, the tips of the tarsi, and sometimes the tibiæ also, ferruginous; the vestiture fine: the head with a fulvous line around the eyes; the prothorax with a space down the middle and some markings towards the sides fulvous, the scattered narrow scales sometimes extending over the greater part of the surface; the elytra mottled with fulvous, white, and blackish scales, the white scales usually condensed into a short faint streak at the middle of the suture, the fulvous scales sometimes extending over the greater part of the surface; the vestiture of the under surface and legs fulvous and white intermixed. Head rather small; eyes moderately large, narrowly separated; rostrum rugulosely punctate and carinate at the base, the apical half dull and finely punctate in the ♂, and shining and almost smooth in the ♀; joint 2 of the funiculus much longer than 1. Prothorax transverse, narrowing from near the base, constricted in front; densely, finely, rugulosely punctate, and also subcarinate. Elytra broad, subcordate, blunt at the tip, somewhat inflated, the sutural region strongly depressed anteriorly; punctate-striate, the interstices broad, densely rugulose, and almost flat. Rostral canal very deep, the metasternal excavation triangular. First ventral segment shallowly depressed down the middle in the ♂.

Length $3\frac{1}{8}$ – $3\frac{1}{2}$, breadth $1\frac{9}{10}$ –2 millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas (*Champion*).

Twelve specimens. Recognizable by the dull, slightly inflated, deeply excavate elytra, the fine vestiture, which is sometimes in great part fulvous, the dull, punctate rostrum of the male, &c. The elytra have, at most, a short faint whitish streak at the middle of the suture.

15. *Lechriops maculiceps*, sp. n. (Tab. VI. fig. 24.)

Subovate, opaque above, black or piceous, the antennæ, the apex of the rostrum, the tips of the tarsi, and the apical margin of the elytra ferruginous; the vestiture very fine: the head with a fulvous line around the eyes, which is divided into spots behind them; the prothorax with a v-shaped patch on the disc at the base, a spot in the middle in front (these markings somewhat united into an irregular cruciform patch), and two others on each side, fulvous, the intervening spaces sometimes with a few white scales; the elytra variegated with small patches of fulvous, white, and blackish scales; the vestiture of the under surface and legs fulvous intermixed with white. Eyes moderately large, narrowly separated. Rostrum carinate and rugulosely punctate at the base. Joint 2 of the funiculus elongate, nearly as long as 3–6 united. Prothorax short, constricted in front, narrowing from near the base; closely punctate, except along the slightly raised median line, the narrow interspaces alutaceous. Elytra broad, subcordate, blunt at the apex, depressed along the suture anteriorly; punctate-striate, the interstices rugulose, dull, and almost flat. Rostral canal deep, extending to the anterior portion of the metasternum. Intermediate posterior knees acutely dentate.

Length $3\frac{1}{2}$ – $3\frac{4}{5}$, breadth $1\frac{3}{4}$ – $2\frac{1}{10}$ millim.

Hab. MEXICO (*Mus. Dresden*), Toxpam in Vera Cruz (*Sallé*), Cerro de Plumas,

Jalapa (*Höge*); GUATEMALA, Chacoj, Panima, Cubilguitz, and San Gerónimo in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Not rare in Mexico and distributed in various collections. The opaque upper surface, the fine vestiture, which is condensed into spots on the head and prothorax, the latter having also a more or less distinct cruciform patch on the disc, and the variegate elytra, sufficiently distinguish *L. maculiceps*. Dr. Heller has sent me a specimen of it under the name "*Copturosomus* sp." There is a very similar unnamed form from Rio Janeiro in the Fry collection.

16. *Lechriops coarctatus*, sp. n. (Tab. VI. fig. 25.)

Subovate, rather broad, dull, nigro-piceous or black, the rostrum sometimes rufescent, the antennæ, the apical margin of the elytra, and the tips of the tarsi ferruginous; the vestiture rather coarse and close: the head and prothorax mottled or variegated with ochreous or fulvous, sometimes with a few white scales intermixed (the head usually with two spots behind each eye, and the prothorax with various small spaces on the disc, bare); the elytra mottled with fulvous (or ochreous), white, and black, the white scales clustered into a few very small scattered spots, the one at the middle of the suture the most conspicuous, and the black ones into a small transverse patch on the suture below the base; the vestiture of the under surface coarser and paler, that of the legs somewhat variegate, the posterior femora with a narrow dark patch towards the apex. Eyes large, narrowly separated. Rostrum carinate and rugulose punctate to about the middle, and finely punctate thence to the apex, the apical half a little smoother in the ♀. Joint 2 of the funiculus much longer than 1. Prothorax broad, transverse, abruptly constricted and narrowed in front; densely punctate and feebly carinate. Elytra broad, somewhat rounded at the tip, the sutural region slightly depressed anteriorly; punctate-striate, the interstices broad, rugose, and feebly convex. Rostral canal deep, reaching as far as the posterior margin of the middle coxæ, the walls complete. First ventral segment broadly and shallowly depressed down the middle in the ♂. Femora sharply dentate.

Length $3\frac{1}{2}$ –4, breadth 2 – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Dresden*), Presidio de Mazatlan (*Forrer*), Toxпам (*Sallé*), Oaxaca (*Höge*); GUATEMALA, Zapote (*Champion*); NICARAGUA, Chontales (*Janson*).

Thirteen specimens. A rather broad, robust form, with the prothorax strongly constricted in front, the vestiture somewhat close and mottled, especially on the elytra, the latter with at most a small white spot at the middle of the suture, the surface dull. Dr. Heller has communicated examples of it under the name of "*Copturosomus* sp."

17. *Lechriops vestitus*. (Tab. VI. fig. 26.)

Copturus vestitus, Boh. in Schönh. Gen. Curc. iv. p. 645¹.

Lechriops vestitus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 14, 15².

Hab. BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Cahabon (*Champion*); COSTA RICA, Surubres (*Biolley*); PANAMA, Bugaba, Volcan de Chiriqui, David, San Feliz (*Champion*).—COLOMBIA, Carthagená¹.

Distinguishable by the rather long, coarse, intermixed fulvous, black, and white vestiture of the upper surface. The white spot at the middle of the suture is some-

times transverse (extending to the second stria), and when this is the case the black patch preceding it is divided by the short fulvous stripe extending down the suture from the base. The dorsal striae 2-4 are somewhat sinuate. The eyes are a little more distant above than they are in front. The second joint of the funiculus is much longer than the first. The first ventral segment is shallowly sulcate down the middle in the male.

18. *Lechriops centrosignatus*, sp. n.

Subovate, dull, black, the antennae, apical margin of the elytra, knees, tibiae, and tarsi more or less ferruginous; variegated above with a somewhat dense clothing of fulvous, black, and white scales (those on the elytra small), the elytra with a large patch at the middle of the suture and a small spot on the eighth interstice yellowish-white, the mesothoracic epimera also whitish; the vestiture of the under surface fulvous and white, the posterior femora with a broad blackish patch at the middle. Eyes large, narrowly separated, acuminate beneath. Rostrum stout, rugulose and finely carinate in its basal half. Joints 1 and 2 of the funiculus equal in length. Prothorax transverse, rounded at the sides anteriorly, abruptly narrowed and constricted in front; densely punctate and finely carinate. Elytra subcordate, blunt at the tip; deeply punctate-striate, the interstices rugulose and feebly convex. Rostral canal deep, reaching the metasternum. First ventral segment with a smooth shallow median sulcus in the ♂. Femora rather stout, sharply dentate.

Length $2\frac{4}{5}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One pair. Smaller and narrower than *L. vestitus*, the elytral vestiture not so coarse, the prothorax abruptly constricted in front, the second joint of the funiculus not longer than the first, the rostrum shorter and stouter. The large white spot at the middle of the suture, much smaller size, narrower form, &c., separate *L. centrosignatus* from *L. coarctatus*. The eyes are larger, and more acuminate beneath, than in the variable *L. oculatus*.

19. *Lechriops lebasii*.

Copturus lebasii, Boh. in Schönh. Gen. Curc. iv. p. 646 ¹.

Lechriops lebasii, Heller, Abhandl. Mus. Dresd. no. 11, pp. 14, 15 ².

Hab. MEXICO, Toxpam (*Sallé*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, San Juan, San Gerónimo (*Champion*); COSTA RICA, Surubres (*Biolley*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—COLOMBIA, Cartagena ¹.

The type of this species, which is in bad condition, is a little larger and more rugose than *L. infimus*, and has the pallid scales on the elytra clustered into a small patch at the middle of the suture, another on the eighth interstice, and various scattered spots or streaks. Various specimens are somewhat doubtfully referred to it, those from the Volcan de Chiriqui wanting the sutural spot. *L. parilis* is a nearly allied form.

20. *Lechriops parilis*, sp. n.

Subovate, dull, black, the antennae, the tip of the rostrum, the apical margin of the elytra, and the tarsi in part or wholly, ferruginous; the vestiture rather sparse: the head with a line around the outer part of

the eyes, and the very narrow space between them, and the prothorax with an interrupted median vitta and some spots or irregular markings at the sides, ochreous or fulvous; the elytra mottled with ochreous (or fulvous) and blackish, the ochreous scales clustered into a small spot at the middle of the suture, a short streak at the apex of the latter, and a spot on the eighth interstice, the blackish scales condensed into two oblong patches along the suture; the vestiture of the under surface fine, sparse, in great part white, the ventral segments 3-5, and sometimes the knees also, fulvous, the femora with a blackish patch towards the apex. Eyes very large, narrowly separated. Rostrum rugulose punctate and finely carinate to near the middle, the apical half shining in both sexes. Joint 2 of the funiculus much longer than 1. Prothorax short, somewhat rounded at the sides, narrowed and feebly constricted in front; densely, rather coarsely punctate, and subcarinate. Elytra much wider than the prothorax, subcordate, feebly depressed along the suture anteriorly, punctate-striate, the interstices rugose and almost flat. Rostral canal deep, the metasternal depression limited by a v-shaped ridge. First ventral segment hollowed down the middle posteriorly in the ♂. Femora sharply dentate, the posterior knees with a short spine.

Length $2\frac{4}{5}$ - $3\frac{1}{2}$, breadth $1\frac{1}{2}$ -2 millim. (♂ ♀.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); GUATEMALA, Cubilguitz in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Ten specimens. Very near *L. lebasii*, but with relatively broader, subcordate elytra. Compared with *L. excavatus*, the elytra are less inflated, and not so deeply excavate along the suture, the apical half of the rostrum is more shining in the male, and the eyes are more approximate above. There are no intermixed white scales on the upper surface. The two specimens from Chiriqui have a less rugose prothorax and they may belong to a different species. The description is taken from the Mexican examples.

21. *Lechriops ochreoguttatus*, sp. n. (Tab. VI. fig. 27.)

Very like *L. parilis*, but with sharply-defined, small, scattered pale ochreous spots on the upper surface—six on the prothorax, one at the middle of the suture, another at its apex, and six smaller ones scattered over each elytron (the three on the outer part of the disc triangularly arranged), the rest of the elytral vestiture black, that of the under surface and legs sparse and whitish, the femora each with a large black patch; the prothorax shining, coarsely punctate; the elytra coarsely punctate-striate, with rugose interstices, the humeral callus smooth; the tarsi ferruginous.

Length $3\frac{4}{5}$, breadth $2\frac{1}{10}$ millim. (♀.)

Hab. MEXICO, Toxpam (*Sallé*).

One specimen. This is a form of *L. parilis*, but it cannot very well be included under that species, the elytral spots being as sharply defined as they are in *L. porcatus*. It is one of many *Lechriops* from "Toxpam" in the *Sallé* collection.

22. *Lechriops extritus*, sp. n.

Subovate, black, the antennæ (the club excepted), apical margin of the elytra, and tarsi ferruginous, the knees and tibiæ sometimes reddish; the vestiture fine and sparse: the prothorax with three faint ochreous vittæ; the elytra with a small spot at the middle of the suture, one at its apex, one on the eighth interstice, and various others (less distinct) on the basal half of the disc, white or ochreous, the rest of their vestiture blackish, the dorsal interstices sometimes sublineate with ochreous; the clothing of the legs and under surface very sparse, fine, white, the posterior femora with indications of a darker patch. Head rather small; eyes moderately large, subcontiguous; rostrum sparsely, minutely punctate, rugulose and subcarinate at the base; joints 1 and 2 of the funiculus subequal in length. Prothorax short,

narrowing from near the base, slightly constricted in front; densely rugulose punctate and feebly carinate. Elytra much wider than the prothorax, blunt at the tip, depressed along the suture anteriorly; deeply punctate-striate, the interstices a little wider than the striae, rugose, faintly costate towards the base. Rostral canal deep, extending into the front of the metasternum. Ventral segments 1 and 2 rather sparsely punctate, 1 shallowly sulcate in the ♂. Femora sharply dentate.
Length $2\frac{2}{3}$ – $3\frac{2}{5}$, breadth $1\frac{1}{2}$ –2 millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Four specimens. Closely related to *L. parilis*, but with a smaller head, smaller eyes, a more conical prothorax, and finer vestiture, the elytral interstices faintly costate at the base. Larger than *L. disparilis*, the elytra with less sharply-defined spots and broader interstices, the vestiture of the under surface sparser and finer.

23. *Lechriops disparilis*, sp. n.

Smaller than *L. extritus*; the prothorax with three faint ochreous or white vittae on the disc, which are sometimes divided into spots; the elytra with traces of a curved, much interrupted fascia extending from the scutellar region to below the humeral callus (often obsolete), a small spot at the middle of the suture, one at its apex, and one on the eighth interstice, white; the vestiture of the under surface coarser and closer, white; the posterior femora with an indication of a dark patch towards the apex; the elytral interstices scarcely wider than the striae, not carinate at the base; the ventral segments more closely punctate, 1 depressed down the middle in the ♂; rostrum carinate and rugulose in its basal half in the ♂, smoother in the ♀.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{1}{8}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Janson*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Nine specimens. Perhaps an extreme form of *L. extritus*. The sparse, blackish general vestiture of the elytra (leaving a few small white spots distinct) distinguishes *L. disparilis* from the variable *L. infimus*, as well as from *L. lebasi*. The present insect is very like *Copturomorpha funerea*, but the latter has a conspicuous concave strigose area on the anterior femora, a dark oblique band on the posterior femora, and the femora themselves unarmed beneath.

24. *Lechriops quadripunctatus*, sp. n. (Tab. VI. fig. 28.)

Of the same size and shape as *L. disparilis*, but duller and more rugose; the prothorax somewhat rounded at the sides, with a faint submarginal vitta on each side and two spots along the median line ochreous; the elytra with a small spot at the middle of the suture, another in a line with it on the eighth interstice, and a few scales at the base, whitish, and a larger spot at the apex ochreous, the interstices broader than the striae; the vestiture of the under surface and legs white, rather coarse; joint 2 of the funiculus a little longer than 1.

Length $2\frac{2}{5}$, breadth $1\frac{1}{3}$ millim. (♀.)

Hab. MEXICO, Teapa in Tabasco (*H. H. Smith*).

Two specimens. Distinguishable from *L. disparilis* and other allied forms by the sharply-defined ochreous apical spot. The upper surface is opaque.

25. *Lechriops nitidiusculus*, sp. n.

Subrhomboidal, shining, black or piceous, the antennæ, apical margin of the elytra, tibiæ, and tarsi more or less ferruginous; the vestiture rather long and fine: the head with a narrow ochreous line around the eyes; the prothorax mottled with fulvous and white, except on the two bare spaces on the disc; the elytra variegated with fulvous, white, and black, the white scales condensed into a small spot at the middle of the suture, another at its apex, and another on the eighth interstice, the suture with an oblong blackish patch below the base and another towards the apex; the under surface and legs white, with fulvous scales intermixed, the posterior femora with a broad dark patch towards the apex. Eyes large, subcontiguous. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus longer than 1. Prothorax short, narrowing from the base; densely punctate and finely carinate. Elytra rather broad, subcordate, blunt at the tip; deeply punctate-striate, the interstices rugulose, shining, broader than the striæ. Rostral canal deep.

Var.? The fulvous scales few in number; the prothorax with six spots or three irregular vittæ white; the elytra mottled with black and white, the white scales clustered into two short streaks on the suture, a spot on the eighth interstice and various interrupted undulate fasciæ.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{3}$ – $1\frac{2}{3}$ millim.

Hab. MEXICO (*Mus. Dresden*), Toxpan, San Andres Tuxtla, Juquila (*Sallé*), Atoyac (*H. H. Smith*); GUATEMALA, Chiacam and Senahu in Vera Paz (*Champion*).

Ten specimens, all but two from Mexico. Larger, broader, and more shining than *L. infimus*, the prothorax subconical. The var.?, represented by four examples from Juquila, approaches *L. alboguttatus*, but has less definite elytral markings.

26. *Lechriops oculatus*.

Cryptorhynchus oculatus, Say, Journ. Acad. Phil. iii. p. 308¹; Complete Writings, ii. p. 172².

Piazurus oculatus, Lec. Proc. Am. Phil. Soc. xv. p. 260³.

Lechriops oculatus, Heller, Abhandl. Mus. Dresd. no. 11, p. 65⁴.

Gelus oculatus, Casey, Ann. N. York Acad. Sci. ix. p. 668⁵.

Lechriops discors, Faust, in litt.⁶

Subovate, dull, black or piceous, the antennæ, apical margin of the elytra, and tarsi ferruginous: the vestiture rather coarse and close, fulvous and white, intermixed with black on the elytra, that on the prothorax condensed into a v-shaped or triangular mark at the base, a spot in the centre in front, and two irregular spots or a stripe on each side, the elytra with a sharply-defined white spot at the middle of the suture, preceded by a black patch and sometimes extending to the second stria, and usually a minute white dot on the eighth interstice; the under surface and legs clothed with fulvous (or rosy-red) and white scales (the former sometimes predominating), the posterior femora with a dark patch towards the apex. Eyes large, subcontiguous. Rostrum rugulose and finely carinate at the base. Joint 2 of the funiculus longer than 1. Prothorax transverse, somewhat rounded at the sides, constricted and narrowed in front; densely punctate and finely carinate. Elytra much wider than the prothorax, subcordate, blunt at the tip; deeply punctate-striate, the interstices a little broader than the striæ, rugose. Rostral canal deep.

Length $2\frac{1}{3}$ –3, breadth $1\frac{1}{3}$ – $1\frac{2}{3}$ millim.

Hab. NORTH AMERICA, Canada, Southern and Western States³.—MEXICO (*Mus. Dresden*), Toxpan (*Sallé*), Motzorongo (*Flohr*), Cerro de Plumas (*Höge*), Atoyac, Cuernavaca, Chilpancingo (*H. H. Smith*); GUATEMALA, Capetillo, San Gerónimo (*Champion*).

Apparently a common insect in Mexico. Central-American specimens differ from

others from North America sent me by Mr. Wickham in having the vestiture a little coarser. *L. oculatus* is closely related to *L. infimus*, having relatively broader elytra, coarser vestiture, and a more sharply defined white sutural spot.

27. *Lechriops sticticus*, sp. n. (Tab. VI. fig. 29.)

Ovate, rather narrow, shining, black, the apical margin of the elytra, the antennæ, tibiæ, and tarsi more or less ferruginous; the prothorax with a median vitta (sometimes broken up into two spots), two submarginal spots, and a streak along the flanks, and the elytra with a transverse mark at the middle of the suture, a streak along the latter at the tip, a small spot on the eighth interstice, another on the tenth, and various scattered patches or short streaks, ochreous or white; the vestiture of the legs and under surface white, the posterior femora sometimes with a darker patch towards the apex. Head rather small; eyes subcontiguous; rostrum rugulose at the base; joints 1 and 2 of the funiculus equal in length. Prothorax transverse, gradually narrowing from the base, feebly constricted in front; densely, finely punctate and obsoletely carinate. Elytra deeply striate, the striæ finely punctate, the interstices rugulose and almost flat. Rostral canal deep, reaching the front of the metasternum, the walls complete.

Length $2\frac{1}{3}$ – $2\frac{2}{3}$, breadth $1\frac{1}{8}$ – $1\frac{3}{8}$ millim.

Hab. MEXICO, Oaxaca and ? Jalapa (*Höge*).

Six specimens, probably all from Oaxaca. A small, narrow form with sharply-defined whitish spots, near *L. alboguttatus*, but of the general shape of *L. porcatus*, differing from the latter in the much narrower striæ of the elytra. The second joint of the funiculus is shorter than in *L. alboguttatus*.

28. *Lechriops bicolor*, sp. n. (Tab. VI. fig. 30.)

hriops bicolor, Faust, in litt.

Subovate, black, the disc of the elytra in great part piceous or rufo-piceous, their apical margin, the antennæ, the tip of the rostrum, the tarsi, and sometimes the femora and tibiæ also, ferruginous; the vestiture fine, sparse, and filiform: the prothorax with three more or less interrupted ochreous or whitish vittæ; the elytra with two broad oblique fasciæ, united along the suture (the posterior one sometimes reduced to a common sutural spot, or the whole of these markings united into a large saddle-shaped patch), a short streak on the eighth interstice, and another at the apex, ochreous or whitish, the white scales sometimes condensed into a spot at the middle of the suture; the under surface and legs white, the posterior femora usually with a dark patch towards the apex. Eyes large, subcontiguous. Rostrum rugulose and carinate at the base. Joint 2 of the funiculus a little longer than 1. Prothorax short, narrowing from near the base, feebly constricted in front; densely punctate and feebly carinate. Elytra subcordate, broadly rounded at the apex; deeply punctate-striate, the interstices rugose, very little wider than the striæ, almost flat. Rostral canal deep, reaching the anterior portion of the metasternum.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{1}{4}$ – $1\frac{3}{8}$ millim.

Hab. MEXICO (*Mus. Dresden*), Toxpan (*Sallé*), Oaxaca (*Höge*), Teapa (*Höge*, *H. H. Smith*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Cubilguitz, Cahabon, San Juan, Chacoj, San Gerónimo, Cerro Zunil (*Champion*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Numerous examples. A very close ally of *L. infimus*, but differing from it in the general coloration of the elytra, as well as in the arrangement of the vestiture. There is sometimes a distinct whitish or ochreous patch at the middle of the suture.

29. *Lechriops analis*, sp. n. (Tab. VI. fig. 31.)

Subovate, black, the elytra with a large patch at the apex, and sometimes a spot on the shoulder or a transverse patch on the disc below the base, rufo-piceous or ferruginous, the antennæ, the tip of the rostrum, and the legs in part, ferruginous; the vestiture fine, piliform, close on the elytra: the prothorax with three, more or less interrupted, fulvous or ochreous vittæ, often with white scales intermixed; the elytra variegated with fulvous (or ochreous), white, and black, the fulvous scales condensed into a large apical patch, and the white ones into a small spot at the middle of the suture (which is preceded by a black patch) and another on the eighth interstice; the under surface and legs white, the flanks of the prothorax often fulvous, the posterior femora with a blackish patch towards the apex. Eyes large, subcontiguous. Rostrum carinate and rugulose at the base. Joint 2 of the funiculus much longer than 1. Prothorax short, narrowing from near the base, constricted in front; densely punctate and feebly carinate. Elytra broad, subcordate, rounded at the apex, with a small smooth humeral callus; deeply punctate-striate, the interstices rugose and slightly wider than the striæ. Rostral canal deep.

Length $2\frac{1}{10}$ – $2\frac{1}{2}$, breadth $1\frac{1}{4}$ – $1\frac{1}{2}$ millim. (♂ ♀).

Hab. MEXICO, Toxpam (*Sallé*), Jalapa (*Höge*); GUATEMALA, near the city, Capetillo, Zapote, Chacoj (*Champion*); NICARAGUA, Chontales (*Janson*); PANAMA, David (*Champion*).

This is a form of *L. infimus* with a large, rufescent, fulvo-squamosa apical patch, which sometimes extends forwards to the middle of the suture, and rather broad, cordate elytra. The description is taken from the numerous specimens from Capetillo and Guatemala City. Three from the latter locality with the elytra mottled with rufo-piceous may also belong here.

30. *Lechriops infimus*.

Copturus infimus, Boh. in Schönh. Gen. Curc. iv. p. 647¹.

Lechriops infimus, Heller, Abhandl. Mus. Dresd. no. 11, pp. 14, 15².

Copturus infimus, var. *β. senilis*, Schönh. loc. cit.³

Lechriops turtur, Faust, Stett. ent. Zeit. 1896, p. 89⁴.

Var. *Lechriops sodalis*, Faust, loc. cit. p. 90⁵.

Hab. MEXICO, Toxpam (*Sallé*), Jalapa (*Smith, ex Wickham*), Teapa (*H. H. Smith*) BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Cahabon, San Juan, Tamahu, and San Gerónimo in Vera Paz (*Champion*); NICARAGUA (*Sallé*), Chontales (*Janson*); COSTA RICA, San José, Reventazon (*Biolley*); PANAMA, Bugaba, Volcan de Chiriqui, Caldera (*Champion*).—COLOMBIA, Carthagen¹; VENEZUELA, Caracas⁴, San Esteban^{4 5} (*Mus. Dresden*).

Var. The prothoracic vestiture more extended, fulvous or ochreous, the disc with two small transverse spots only bare.

Lechriops helleri, Faust, in litt.

Hab. MEXICO (*Mus. Dresden*), San Andres Tuxtla (*Sallé*), Fortin (*H. H. Smith*).

A common species in Central America. It is a small, rather narrow form, with the fine, scattered, ochreous or whitish, vestiture condensed on the prothorax into three irregular vittæ, and that on the elytra into numerous small patches or interrupted lines

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PP

and a spot at the middle of the suture. The first two joints of the funiculus are subequal in length. In two of the smallest specimens the femoral tooth is almost or quite obsolete. The type of *C. infimus* has been communicated by Dr. Aurivillius and those of *L. turtur* and *L. sodalis* by Dr. Heller.

31. *Lechriops auritus*. (Tab. VI. fig. 32.)

Copturus infimus, Boh., var. γ . *auritus*, Schönh. Gen. Cure. viii. 2, p. 108¹.

Lechriops auritus, Heller, Abhandl. Mus. Dresd. no. 11, p. 14, nota².

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*), Atoyac, Orizaba, Cuernavaca (*H. H. Smith*), Teapa (*Sallé*, *H. H. Smith*), Tapachula (*Höge*); GUATEMALA, Chacoj, San Juan, San Joaquin, San Gerónimo, Capetillo, Zapote (*Champion*), Champerico (*Baker*, in *Mus. Brit.*); COSTA RICA, Surubres (*Biolley*); PANAMA, Volcan de Chiriqui, Boquete, Caldera (*Champion*).—COLOMBIA¹.

Found in abundance at Teapa, apparently in company with *L. infimus*, from which it differs in having a broad space along the sides of the prothorax densely clothed with rather coarse white scales. The prothorax is somewhat finely punctate and usually has two short, narrow, bare vittæ on the posterior lobe. The elytra have a transverse white spot at the middle of the suture, preceded by a dark patch, and a very small white spot on the eighth interstice. The first two joints of the funiculus are subequal in length. I have not seen the type of *L. auritus*, but there is little doubt about the determination. According to Heller², it is a good species.

32. *Lechriops infusus*, sp. n. (Tab. VII. fig. 1.)

Lechriops infusus, Faust, in litt.

Subovate, black or piceous, the elytra sometimes rufo-piceous, the antennæ, apical margin of the elytra, tarsi, and sometimes the tibiæ and knees also, ferruginous; the vestiture rather coarse and close: the prothorax with a broad space along the sides, and sometimes the lower part of the flanka also, densely clothed with coarse white (or pale ochreous) scales, the disc with longer piliform scales down the middle; the elytra with a large spot at the middle of the suture, a streak along the latter at the apex, and a spot on the eighth interstice, white (or pale ochreous), the rest of their surface variable in colour, according to the predominance of the white (or pale ochreous) and black (or fuscous) scales; the under surface thickly clothed with coarse white or whitish scales, the vestiture of the legs similarly coloured, the posterior femora with a large blackish patch towards the apex. Eyes large, narrowly separated. Rostrum rugulose and carinate to about the middle. Joint 2 of the funiculus a little longer than 3. Prothorax transverse, narrowing from near the base; densely punctate and finely carinate. Elytra much wider than the prothorax, subcordate, rounded at the tip; punctate-striate, the interstices broader than the atriæ, rugose, and almost flat. Rostral canal deep. First ventral segment broadly depressed down the middle in the ♂.

Length $2\frac{1}{2}$ – $3\frac{2}{5}$, breadth $1\frac{1}{3}$ – $1\frac{7}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Dresden*), Chilpancingo and Amula in Guerrero (*H. H. Smith*), Toxpam, Juquila (*Sallé*), Cordova, Cerro de Plumas, Oaxaca (*Höge*), Jalapa (*Smith*, ex *Wickham*); GUATEMALA, Senahu, Sinanja, Chacoj, Capetillo, Guatemala City, Zapote (*Champion*).

A very variable insect and apparently common in Mexico. It is larger and longer than *L. auritus* and has the vestiture coarser. The broad white band on each side of the prothorax and the four white spots on the elytra are sharply defined in the specimens from Guerrero, which may be taken as the types. The Guatemalan examples, some of which have the whole of the flanks of the prothorax albo-squamose, are mostly discoloured or partially abraded. Dr. Heller has sent me specimens from Mexico under the name *L. infusus*, Faust.

33. *Lechriops festivus*, sp. n. (Tab. VII. fig. 2.)

Lechriops festivus, Faust, in litt.

Subovate, black, the elytra sometimes variegated with rufo-piceous, their apical margin, the apex of the rostrum, the antennæ, and tarsi more or less ferruginous; the prothorax with a broad space along the sides (sometimes divided into two sinuous lines or reduced into a subquadrate patch at each hind angle), extending on to the shoulders and mesothoracic epimera, and the elytra with a rounded spot of variable size at the middle of the suture, and a minute spot on the eighth interstice, clothed with coarse white or pale ochreous scales, the disc of the prothorax with hair-like ochreous scales along the middle, the rest of the elytra variegated with fine cinereous, ochreous, and blackish scales, the ochreous scales clustered into a streak along the apical portion of the suture (extending from the white spot to the tip) and the black ones into a patch on the suture below the base; the vestiture of the under surface and legs rather coarse, white or ochreous, the posterior femora with a dark patch. Eyes large, subcontiguous. Rostrum rugulose and feebly carinate at the base. Joint 2 of the funiculus a little longer than 1. Prothorax short, constricted in front, narrowing from the base; densely punctate and obsoletely carinate. Elytra short, broad, subcordate, rounded at the tip; deeply punctate-atriate, the interstices slightly wider than the striæ, rugose. Rostral canal deep, reaching into the metasternum.

Length $2\frac{2}{5}$ –3, breadth $1\frac{1}{2}$ –2 millim.

Hab. MEXICO (*Mus. Dresden*), Toxpan (*Sallé*), Atoyac, Teapa (*H. H. Smith*), Motozongongo (*Flohr*), Jalapa (*Höge*); GUATEMALA, Senahu, Chacoj, San Gerónimo (*Champion*); NICARAGUA, Chontales (*Janson*).

Numerous examples, three of which have the white sutural spot small; two others, from Guatemala, have the white band at the sides of the prothorax reduced to a subquadrate basal patch. In the typical specimens, from Atoyac, &c., the sutural spot is large and sharply defined. *L. festivus* is a form of *L. auritus* with relatively broader elytra and a more rugose surface. It has shorter elytra than *L. infusus*. The suture from the white spot to the apex is bordered with ochreous or fulvous scales.

34. *Lechriops paroticus*. (Tab. VII. fig. 3.)

Copturus paroticus, Pasc. Ann. & Mag. Nat. Hist. (5) v. p. 496¹.

Lechriops (?) *paroticus*, Heller, Abhandl. Mus. Dresd. no. 11, p. 68².

? *Copturus latericollis*, Jekel, in litt.³

Hab. NICARAGUA, Chontales (*Janson*); PANAMA, Bugaba, Volcan de Chiriqui, Caldera, Tolé, San Feliz (*Champion*).—BRAZIL³, Parana¹.

This insect, described from a single specimen from Parana, has a broad, dense, curved band of coarse pale ochreous scales on each side of the prothorax, and four

small similarly-coloured spots on the elytra (one at the middle of the suture, another at its apex, and one on the eighth interstice of each elytron), the rest of the vestiture of the latter dark and fine. The elytral interstices are wider than the striae and very rugose.

35. *Lechriops alboterminatus*, sp. n. (Tab. VII. fig. 4.)

Subrhomboidal, short, black, the antennae, apices of the tibiae, tarsi, and apical margin of the elytra ferruginous, the disc of the prothorax and the base of the elytra piceous; the head between and behind the eyes, the prothorax with a broad space along the sides, extending on to the humeri and mesothoracic epimera, the elytra with a minute or small spot at the middle of the suture, another on the eighth interstice, and the apex, the middle femora at the tip, the posterior femora (a black band near the apex excepted), the metasternum, and abdomen, thickly clothed with rather coarse white or brownish-white scales, the disc of the prothorax and the scutellar region with fine ochreous hair-like scales, the rest of the vestiture very fine and sparse, blackish on the elytra, with a few scattered white scales intermixed. Eyes large, subcontiguous. Rostrum rugulose and feebly carinate at the base. Joint 2 of the funiculus slightly longer than 1. Prothorax short, conical; densely punctate and subcarinate. Elytra short, broad, subcordate, blunt at the tip, depressed along the suture anteriorly, with a small smooth humeral callus; deeply punctate-striate, the interstices about as wide as the striae, rugulose, and with a faint raised line on each side. Rostral canal deep, reaching the anterior portion of the metasternum, the walls complete.

Length $2\frac{1}{2}$, breadth $1\frac{2}{3}$ millim.

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

One specimen from each locality. The Guatemalan example (fig. 4), which has the white stripe at the sides of the prothorax bordered within by a sinuous dark line, is taken as the type. This species is an ally of *L. auritus*, differing from it in having the apex of the elytra clothed with white scales, the striae broader and deeper, the interstices subcostate on each side, &c.

36. *Lechriops porcatus*, sp. n. (Tab. VII. fig. 5.)

Ovate, rather convex, shining, black, the tarsi and the apical margin of the elytra ferruginous; the prothorax with a median vitta, two submarginal spots, and a line along the flanks, the elytra with a spot at the middle of the suture, an oblong mark at its apex, a spot at the sides beyond the middle, and some short streaks at the base, clothed with coarse white scales, the rest of the upper surface with fine scattered blackish scales; the under surface and legs coarsely albo-squamose, the posterior femora with an oblique blackish band towards the apex. Eyes subcontiguous. Rostrum rugosely punctate at the base. Funiculus widening outwards, the outer joints strongly transverse, 2 a little shorter than 1. Prothorax transverse, somewhat rounded at the sides, narrowed in front; densely punctate and feebly carinate. Elytra conjointly rounded at the tip, punctato-sulcate, the interstices not wider than the striae, shallowly uniseriate-punctate, and with a very fine raised line on each side. Rostral canal deep, extending into the front of the metasternum. Femora dentate, the posterior pair finely carinate externally.

Length $2\frac{1}{2}$, breadth $1\frac{1}{3}$ millim.

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two specimens. A rather convex, narrow form, with punctato-sulcate elytra, the interstices of which are not wider than the striae, the prothorax and elytra with sharply-defined white spots, the second joint of the funiculus shorter than the first.

37. *Lechriops durangoanus*, sp. n. (Tab. VII. fig. 6.)

Subovate, shining, nigro-piceous, the rostrum, antennæ, tarsi, and apical margin of the elytra ferruginous; variegated with small, narrow, blackish and ochreous scales, the ochreous scales on the prothorax condensed into six spots on the disc and some irregular markings on the flanks, and those on the elytra mainly into some short streaks at the base, a large spot at the middle of the suture (extending outwards to the second stria), a smaller spot on the eighth interstice in a line with it, and a streak along the suture at the tip, the basal margin of the prothorax clothed with white scales on each side; the vestiture of the under surface and legs rather sparse, in great part white, the meso- and metathoracic side-pieces each with an ochreous spot, and the ventral segments 3-5 almost wholly of that colour, the femora each with a dark patch. Head rather small; eyes narrowly separated; rostrum short, rugulosely punctate and feebly carinate at the base; joint 2 of the funiculus much longer than 1. Prothorax transverse, narrowing from the base, constricted in front; densely punctate and subcarinate. Elytra about one-half wider than the prothorax, moderately long, somewhat rounded at the sides, obliquely truncate at the tip, depressed along the suture anteriorly; deeply punctate-striate, the interstices rugulose and feebly convex. Mesosternum vertical, excavate. Metasternum simply declivous in front.

Length 4, breadth $2\frac{1}{2}$ millim.

Hab. MEXICO, Ciudad in Durango (*Höge*).

One specimen. A species with rather long, broad elytra, short rostrum, and short rostral canal, the metasternum unimpressed. The ochreous spot at the middle of the suture is large. This is one of the few forms received by us from Northern Mexico, and, like *L. oblongulus*, it is not very closely allied to any of the others here described.

38. *Lechriops flavofasciatus*, sp. n. (Tab. VII. fig. 7.)

Oblong-elliptic, rather narrow, shining, piceous, the apical margin of the elytra rufous; sparsely squamose, the scales on the prothorax white and condensed into three interrupted vittæ, the elytra with a basal fascia of coarse ochreous scales, the suture narrowly and a spot at the sides beyond the middle white, the seriate punctures each with a piliform scale; the under surface clothed with coarse white scales, the vestiture of the legs fine and also white. Eyes very large, narrowly separated. Rostrum rugose and carinate at the base. Joint 2 of the funiculus elongate, much longer than 1. Prothorax short, slightly narrowed in front; coarsely, densely punctate, and feebly carinate. Elytra broadly and separately rounded at the apex, the humeri smooth and bare; deeply punctate-striate, the interstices narrow and rugose. Mesosternal excavation shallow, limited on each side by a curved ridge, the metasternum gradually declivous in front. Legs short; femora obsoletely dentate, the posterior pair carinate externally; tarsi comparatively long.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One rather worn specimen. In this small species the elytra have a transverse band of coarse ochreous scales at the base and a conspicuous white spot at the sides beyond the middle, the rostral canal does not extend beyond the mesosternum, &c.

EULECHRIOPS.

Eulechriops, Faust, Stett. ent. Zeit. 1896, p. 91, nota.

? *Zygomicrus*, Casey, Ann. N. York Acad. Sci. ix. pp. 667, 679 (1897).

Faust placed four S.-American species under the generic name *Eulechriops*, which may be distinguished in a general way from *Lechriops* by the unarmed, non-carinate femora. Amongst the numerous forms here provisionally referred to it, there are

several with the femora sulcate along the greater part of their length beneath, one (*E. septemnotatus*) with the anterior femora feebly dentate, and one (*E. squamulatus*) with the posterior femora faintly carinate. In *E. tenuirostris* and its allies, which will probably have to be separated eventually, the antennæ are inserted very near the base of the rostrum, the prothorax is more or less conical, and the rostrum and rostral canal are sometimes longer in the female than in the male. In *E. scutulatus* and *E. coruscus* the meso- and metasternal excavation is wanting. The mesothoracic epimera often ascend more or less, and some of the species (*E. nitidus* and *E. coruscus*) might easily be mistaken for Barids, from which they may be distinguished by the form of the eyes.

The various Central-American forms, many of which are represented in our collection by a single example only, may be grouped thus:—

- a. Anterior femora obsoletely dentate, the others unarmed, the posterior pair not carinate externally, all sulcate along the greater part of their length beneath; rostral canal not extending beyond the mesosternum Species 1.
- b. All the femora unarmed, the posterior pair not or rarely carinate externally.
 - a¹. Antennæ (except in *E. levirostris*) inserted at some distance from the base of the rostrum, the latter usually rather stout.
 - a². Rostral canal reaching about as far as the posterior margin of the middle coxæ.
 - a³. Femora sulcate along the greater part of their length beneath; joints 1 and 2 of the funiculus subequal in length Species 2.
 - b³. Femora sulcate at the apex only beneath.
 - a⁴. Eyes smaller; joints 1 and 2 of the funiculus subequal in length.
 - a⁵. Vertex with a conspicuous smooth flattened space down the middle; elytral striæ broad: body subrhomboidal, the vestiture coarse, the scales on the elytra oval Species 3.
 - b⁵. Vertex simply punctate; elytral striæ narrow: body oblong, the vestiture rather coarse and overlapping Species 4.
 - b⁴. Eyes very large; joint 2 of the funiculus longer than 1; prothorax hollowed at the apex, with feebly-developed ocular lobes Species 5.
- b². Rostral canal extending well into the vertical anterior face of the mesosternum, not reaching as far as the posterior margin of the middle coxæ; joint 2 of the funiculus not longer than 1.
 - c³. Femora sulcate along the greater part of their length beneath Species 6–16.
 - d³. Femora sulcate at the apex only beneath.
 - c⁴. Body oblong Species 17, 18.
 - d⁴. Body ovate Species 19.
- c². Rostral canal (as seen from above) not extending beyond the mesosternum.
- e³. Prothorax subcylindrical; prosternum with a conical tubercle behind each anterior coxa; femora sulcate at the apex only beneath Species 20.
- f³. Prothorax more narrowed anteriorly; prosternum without conspicuous tubercle behind the anterior coxæ.

- e*⁴. Femora sulcate along the greater part of their length beneath.
*c*⁵. Mesosternal depression transverse, very shallow * Species 21–23.
*d*⁵. Mesosternal depression deeper † Species 24–28.
*f*⁴. Femora (or at least the anterior pair) sulcate at the apex only beneath.
*e*⁵. Mesosternal depression very shallow Species 29.
*f*⁵. Mesosternal depression deeper Species 30–32.
*b*¹. Antennæ inserted close to the base of the rostrum, the latter long and slender, sometimes reaching the middle of the metasternum in the ♀; prothorax conical, narrow; eyes rather small; joint 2 of the funiculus not longer than 1; femora sulcate at the apex only beneath; rostral canal deep, extending as far as, or beyond, the middle coxæ Species 33–37.

1. *Eulechriops septemnotatus*, sp. n. (Tab. VII. fig. 8.)

Subovate, black, the antennæ, rostrum, elytra (except at the sides towards the apex), tibiæ, and tarsi more or less ferruginous; the prothorax with a broad stripe at the sides (excised within and extending to very near the anterior margin) and a spot in the middle at the base (and in one specimen another at the apex), the elytra with a large scutellar spot, another at the sides beyond the middle, and an oblong streak on the suture at the tip, and the under surface in great part, densely clothed with coarse white scales; the rest of the vestiture of the upper surface finer, ochreous, and arranged in lines on the elytra, that of the legs yellowish-white. Eyes moderately large, subcontiguous. Rostrum arcuate, rugulose and subcarinate at the base. Joints 1 and 2 of the funiculus subequal in length. Prothorax transverse, narrowed and constricted in front; densely, finely punctate, and obsoletely carinate. Elytra much wider than the prothorax, rounded at the tip; deeply punctate-striate, the interstices not wider than the striæ, rugose, and rather convex. Mesosternal excavation deep, the metasternum strongly declivous in front. Legs short; femora stout, deeply sulcate beneath, the anterior pair only with a blunt tooth, the others unarmed.

Length 3, breadth $1\frac{1}{2}$ millim.

Hab. GUATEMALA, Dueñas (*Champion*).

Two specimeus. Very like *E. ductilis*, but with larger white spots, the one on each side of the prothorax almost reaching the apex (and shaped as in *Lechriops auritus*), the elytra almost wholly ferruginous and without white scales along the basal margin, the anterior femora with a short tooth.

Smaller than *Copturomorpha 11-notata*, the anterior femora without trace of bare strigose area, but armed with a small tooth.

2. *Eulechriops ochraceus*, sp. n. (Tab. VII. fig. 9.)

Ovate, piceous, the antennæ, the apical margin of the elytra, and the tips of the tarsi ferruginous; somewhat thickly clothed with narrow ochreous scales, the elytra with a broad indeterminate fascia before the middle and a patch on the disc towards the apex brownish (leaving a basal and a subapical fascia, and the suture in great part, ochreous). Eyes moderately large, almost contiguous in front. Rostrum arcuate, sparsely punctate, rugulose and subcarinate at the base. Joints 1 and 2 of the funiculus subequal in length. Prothorax transverse, rather convex, rounded at the sides, narrowed and constricted in front; densely punctate and subcarinate. Elytra moderately broad, blunt at the apex; punctate-striate, the interstices

* Wanting in *E. scutulatus*, which has a very short second joint to the funiculus.

† Almost obsolete in *E. coruscus*.

rugose. Rostral canal deep, extending as far as the posterior margin of the middle coxæ. Legs short; femora deeply sulcate beneath, unarmed.

Length $3\frac{1}{4}$ – $3\frac{3}{8}$, breadth $1\frac{1}{5}$ –2 millim.

Hab. GUATEMALA, Sinanja in Vera Paz (*Champion*).

Two specimens. The vestiture of the prothorax and under surface in this species is almost wholly ochreous, the elytra with indeterminate darker markings.

3. *Eulechriops squamulatus*, sp. n. (Tab. VII. figg. 10, 10 a.)

Subrhomboidal, somewhat flattened above, nigre-piceous, the antennæ and the apical margin of the elytra more or less ferrugineous; variegated with a dense clothing of coarse white, ochreous, and brown scales, those on the elytra oval, and arranged in a single row along each stria and in a single or double row on each interstice, the white scales sometimes clustered into denser patches; the vestiture of the under surface coarse, dense, and almost wholly white. Head with a smoother bare space along the middle of the vertex; eyes large, descending, narrowly separated; rostrum arcuate, about as long as the head and prothorax, rugosely punctate, squamose, and feebly carinate at the base, for the rest smooth and shining; joints 1 and 2 of the funiculus equal in length. Prothorax transverse, hollowed at the apex, narrowing from near the base, constricted in front; densely punctate. Elytra wider than the prothorax, rounded-triangular, deeply punctate-striate, the interstices not wider than the broad striæ, rugulose. Rostral canal reaching as far as the posterior margin of the middle coxæ, the metasternal depression shallow, the mesosternal carinæ not very prominent. Legs short; femora unarmed, the intermediate and posterior pairs faintly carinate externally.

Length 3 – $3\frac{1}{2}$, breadth $1\frac{3}{5}$ – $1\frac{7}{8}$ millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); GUATEMALA, San Gerónimo, Guatemala City, Dueñas (*Champion*).

Ten specimens. Very like *Cylindrocopturus albonotatus* and *C. imbricatus*, but with the meso- and metasternum channelled for the reception of the rostrum. The seriate punctures of the elytra each bear a rather large oval scale; the striæ and interstices are subequal in width.

4. *Eulechriops nigrolineatus*, sp. n. (Tab. VII. fig. 11.)

Oblong-ovate, nigre-piceous, the antennæ, the tip of the rostrum, apical margin of the elytra, and tarsi ferruginous; thickly clothed with coarse, brown, overlapping scales, with ochreous and whitish scales intermixed, these latter clustered into a common transverse patch below the base and another at about one-third from the apex, the intervening portion of the second interstice black, the seriate elytral punctures each bearing a minute scale, the scales on the prothorax condensed into three vittæ. Eyes moderately large, narrowly separated. Rostrum stout, feebly arcuate, about as long as the head and prothorax, somewhat closely punctate, rugose at the base. Joints 1 and 2 of the funiculus about equal in length. Prothorax rather convex, broader than long, slightly rounded at the sides, narrowed and constricted in front; densely, rugosely punctate, and sharply carinate. Elytra much wider than the prothorax, moderately long, separately rounded at the apex; punctate-striate, the striæ narrow, the interstices broad, rugulose, flat. Rostral canal reaching as far as the posterior margin of the middle coxæ, the broad metasternal depression shallow, the mesosternal carinæ sharp. Legs short; femora unarmed.

Length $3\frac{1}{2}$ –4, breadth $1\frac{1}{5}$ – $1\frac{9}{10}$ millim.

Hab. MEXICO, Yautepec in Morelos (*Höge*).

Two specimens, discoloured by immersion in alcohol. A species approaching the genus *Cylindrocopturus*, but with the rostral canal extending to the meso- and

metasternum. The black line at the middle of the second elytral interstice is sharply defined.

5. *Eulechriops boops*, sp. n. (Tab. VII. figg. 12, 12 a.)

Elliptic, black, the antennæ and the apical margin of the elytra obscure ferruginous; the prothorax, and the elytra with the base, a transverse postmedian fascia, suture, and apical margin clothed with very small, narrow, cinereous scales, the rest of the elytral vestiture sparse, fuscous, that of the under surface and legs white. Eyes very large, almost contiguous in front. Rostrum arcuate, long, rugulosely punctate and subcarinate at the base. Joint 2 of the funiculus much longer than 1, as long as 3 and 4 united. Prothorax short, gradually narrowing from the base, hollowed at the apex, and with feebly developed ocular lobes; densely finely punctate, and in one specimen carinate. Elytra much wider than the prothorax, rounded-triangular, separately rounded at the tip; punctate-striate, the interstices rugose. Rostral canal deep, rather narrow, reaching as far as the posterior margin of the middle coxæ. Legs comparatively short; femora unarmed, the posterior pair about reaching the apex of the abdomen.

Length $2\frac{1}{3}$ -3, breadth $1\frac{1}{3}$ - $1\frac{1}{2}$ millim.

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two specimens, the larger one somewhat worn. Distinguishable by the cinereo-bifasciate elytra, large eyes, long second joint of the funiculus, and deep rostral canal. The vestiture of the prothorax is uniform, instead of being condensed into sharply defined spots as in *E. albofasciatus*. The prothorax is hollowed in front, much as in *Lechriops copturoides*.

6. *Eulechriops melas*, sp. n. (Tab. VII. fig. 13.)

Broad-ovate, black, the antennæ and the tips of the tarsi ferruginous; the prothorax with three small spots at the base and one in the middle in front, and the elytra with a short streak on the second interstice below the base, another on the suture towards the tip, and a small spot on the eighth interstice beyond the middle, clothed with coarse, narrow, yellowish-white scales, the rest of the vestiture of the upper surface brown, sparse, and fine; the under surface with scattered narrow whitish scales, the ventral segments 3-5 bordered externally with a line of coarser ochreous scales, which is continued across the apical portion of 2, the femora each with a patch of whitish scales about the middle. Head finely punctate; eyes large, contiguous in front; rostrum stout, arcuate, thickly punctate and carinate at the base; joints 1 and 2 of the funiculus equal in length. Prothorax transverse, rather convex, rounded at the sides, narrowed and constricted in front, deeply bisinuate at the base; densely, coarsely punctate, and feebly carinate. Elytra broad, somewhat rounded at the sides, blunt at the tip; coarsely punctate-striate, the interstices asperato-punctate. Rostral canal very deep, extending beneath the anterior margin of the metasternum. Intermediate coxæ widely separated. Legs short; femora unarmed, sulcate beneath.

Length $4\frac{1}{10}$ - $4\frac{1}{3}$, breadth $2\frac{1}{3}$ - $2\frac{1}{2}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); GUATEMALA, Telemán in Vera Paz (*Champion*).

Two specimens, agreeing perfectly *inter se*, both from the Atlantic slope. A broad-ovate, rugose, black form, with several small scattered whitish spots on the prothorax and elytra, and a common ochreous annulus on the apical half of the abdomen. The rostral canal is broad and very deep.

7. **Eulechriops lugubris**, sp. n. (Tab. VII. fig. 14.)

Ovate, black, the antennæ and tips of the tarsi ferruginous; the upper surface sparsely clothed with fine, narrow, fuscous, and the under surface with longer and coarser, white, scales, the elytra with a few hair-like white scales beyond the middle, these being condensed into a short line on the fifth interstice. Eyes large, contiguous in front. Rostrum rugulosely punctate and carinate at the base. Joint 2 of the funiculus a little shorter than 1. Prothorax transverse, rather convex, rounded at the sides, constricted and narrowed in front; densely, coarsely punctate and carinate. Elytra broad, obliquely truncate at the tip; coarsely punctate-striate, the interstices asperato-punctate. Rostral canal deep, extending beneath the emarginate anterior margin of the metasternum. Legs short; femora unarmed, sulcate beneath.

Length $3\frac{2}{3}$, breadth 2 millim.

Hab. PANAMA, near the city (*Champion*).

One specimen. Smaller than *E. melas*, the elytra with a short line of narrow white scales on the fifth interstice beyond the middle (instead of two conspicuous yellowish-white spots near the suture), the metasternum deeply emarginate in front, the ring of ochreous scales on the abdomen wanting.

8. **Eulechriops melancholicus**, sp. n. (Tab. VII. fig. 15.)

Oblong-elliptic, robust, shining, black, the antennæ and tarsi ferruginous; sparsely clothed with small, narrow, white scales, which on the prothorax are mostly clustered along the basal margin, those on the elytra condensed into a faint, common, curved fascia before the middle, extending along the suture to the base, and a broad streak along the suture at the apex, the rest of the elytral surface with scattered darker scales. Head sparsely punctate; eyes moderately large, subcontiguous; rostrum widened towards the base and apex, rugulosely punctate, smooth along the middle; joint 2 of the funiculus shorter than 1. Prothorax broader than long, rather convex, somewhat rounded at the sides, narrowed and constricted in front; closely punctate, the punctures well separated one from another, the disc distinctly carinate down the middle. Elytra much wider than the prothorax, separately rounded at the apex; deeply punctate-striate, the interstices uniseriate-punctate. Rostral canal very deep, extending beneath the anterior margin of the metasternum. Legs short and stout; femora unarmed, sulcate beneath.

Length 3, breadth $1\frac{1}{2}$ millim.

Hab. GUATEMALA, Zapote (*Champion*).

One specimen. Not unlike *Lechriops sciurus* (the type of the genus *Lechriops*), but more elongate, the punctuation of the prothorax finer and not so close, the elytra faintly albo-fasciate below the base, the femora more robust and unarmed, the eyes less acuminate below.

9. **Eulechriops brevipes**, sp. n. (Tab. VII. fig. 16.)

Ovate, rather convex, shining, black, the rostrum, antennæ, apical margin of the elytra, knees, tibiae, and tarsi ferruginous; the prothorax with a broad space along the sides and a spot in front of the scutellum, the elytra with several short streaks at the base, the suture, a rather broad angulate fascia beyond the middle, and a transverse fascia at the apex (the two fasciæ connected along the suture and fourth interstice), a spot on the mesothoracic epimera, the metasternum, and abdomen, thickly clothed with narrow yellowish-white scales, the rest of the surface, the legs included, almost bare or with minute scattered hair-like scales. Head small; eyes contiguous, moderately large; rostrum stout, rugulose and subcarinate at the base, smooth at the tip; joints 1 and 2 of the funiculus equal in length, 5-7 transverse. Prothorax short, narrowing from the base; densely, very finely punctate, and obsoletely carinate.

Scutellum small. Elytra much wider than the prothorax, rounded at the sides, broadly truncate at the tip; deeply punctate-striate, the interstices punctulate and feebly convex. Mesosternal depression very broad, limited on each side by an oblique ridge. Intercostal portion of the metasternum broad, deeply, semicircularly excavate in front. Legs very short; femora unarmed, sulcate beneath, the posterior pair not reaching beyond the second ventral suture.

Length $2\frac{1}{4}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Volcan de Chiriqui 8000 feet (*Champion*).

One specimen. This species—one of many interesting forms obtained in the bamboo-thickets at a high elevation on the forest-clad slope of the Volcan de Chiriqui—may be known by its broad, rounded-subquadrate, sharply fasciate elytra, narrow, subconical, laterally vittate prothorax, and very short legs. The mesosternal depression is broad, and the rostral canal extends to the front of the metasternum.

10. *Eulechriops tuberculifer*, sp. n. (Tab. VII. figg. 17, 17 a.)

Ovate, rather convex, piceous, the head, antennæ, rostrum, anterior lobe of prothorax, shoulders and apical portion of elytra, tip of abdomen, and legs more or less ferruginous; the vestiture fine, flavo-cinereous, sparser on the middle of the prothorax and condensed into narrow lines on the elytra, the elytra with a darker transverse fascia before the middle and a short whitish streak a little below the base of the first and second interstices, the prothorax with a patch at each hind angle and a short streak at the middle of the base, and the under surface and legs, also whitish. Eyes large, contiguous in front. Rostrum areolate, sparsely punctate, rugulose at the base. Joint 2 of the funiculus shorter than 1. Prothorax transverse, somewhat rounded at the sides, constricted and narrowed in front; densely, finely punctate, and obsoletely carinate. Elytra much wider than the prothorax, rounded-triangular, short, conjointly rounded at the apex; punctate-striate, the interstices not wider than the striæ, rugose. Rostral canal deep, broad, the metasternal excavation short and triangular. First ventral segment with a prominent compressed tubercle in the middle at the apex. Legs short; femora sulcate beneath, unarmed.

Length $2\frac{1}{4}$, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. GUATEMALA, San Gerónimo (*Champion*).

One specimen. This is the only Zygopid I have seen as yet with a tubercle on the first ventral segment.

11. *Eulechriops flavitarsis*, sp. n. (Tab. VII. fig. 18.)

Ovate, somewhat flattened above, black, the antennæ, rostrum, tibiæ, tarsi, and apical margin of the elytra rufo-testaceous; the head with a line around the eyes, the prothorax in great part (a large rounded patch on the disc excepted), the elytra with numerous short streaks at the base, across the middle (here forming an irregular, common, arcuate fascia), and at the apex, the under surface, and legs, somewhat thickly clothed with rather coarse, narrow, white scales, the rest of the vestiture of the prothorax and elytra sparse and brownish. Eyes moderately large, almost contiguous. Rostrum slender, arcuate, rugulose punctate at the base. Joint 2 of the funiculus a little shorter than 1. Prothorax transverse, narrowing from the base, strongly constricted in front; densely, finely punctate. Elytra rather broad, rounded at the apex; punctate-striate, the interstices very little wider than the striæ, rugulose, flat. Rostral canal broad, deep, smooth, extending into the anterior portion of the metasternum. Legs short femora deeply sulcate beneath, unarmed.

Length $2\frac{1}{2}$, breadth $1\frac{2}{5}$ millim.

Hab. GUATEMALA, Dueñas (*Champion*).

One specimen. Less depressed above than *E. maculicollis*, the markings very different, the elytra more narrowed behind, the femora black, the rostral canal extending beneath the hollowed anterior margin of the metasternum.

12. *Eulechriops albofasciatus*, sp. n. (Tab. VII. fig. 19.)

Ovate, nigro-piceous or black, the rostrum, antennæ, apical margin of the elytra, and legs ferruginous; the prothorax with a large spot at each angle (the anterior one extending down the flanks) and two others along the middle of the disc, the elytra with two transverse fasciæ (one basal, the other beyond the middle, and both interrupted by the striæ), the posterior one extending narrowly along the suture to the tip, and the under surface, thickly clothed with coarse white scales; the rest of the vestiture sparse and rather fine, blackish-brown on the elytra, white on the legs. Eyes large, subcontiguous. Rostrum rather short, sparsely, finely punctate, rugulose at the base. Joint 2 of the funiculus a little shorter than 1. Prothorax short, constricted and narrowed in front; densely, finely punctate, and also carinate. Elytra somewhat rounded at the sides, blunt at the tip; deeply punctate-striate, the interstices rugulose, not wider than the striæ. Rostral canal broad and deep, extending into the anterior portion of the metasternum. Legs short, femora unarmed, sulcate beneath.

Length $2\frac{1}{5}$ – $2\frac{1}{4}$, breadth $1\frac{1}{8}$ – $1\frac{1}{4}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. The six white spots on the prothorax and the two transverse white fasciæ of the elytra distinguish *E. albofasciatus*.

13. *Eulechriops ornatus*, sp. n. (Tab. VII. fig. 20.)

Short ovate, black, the antennæ, tip of the rostrum, apical margin of the elytra, and tarsi more or less ferruginous; the prothorax with three spots at the base and three at the apex, and the elytra with various short streaks at the base and apex, one on the suture towards the tip, and one near the middle of each of the interstices 4, 6, and 8, clothed with rather coarse, narrow, white scales; the rest of the vestiture of the upper surface fuscous, sparse, and fine, that of the under surface and legs coarser, closer, and wholly white. Eyes very large, contiguous in front. Rostrum arcuate, rugulosely punctate and finely carinate at the base. Joints 1 and 2 of the funiculus equal in length. Prothorax rather convex, transverse, subconical, constricted in front; densely, coarsely punctate, and carinate. Elytra rather short and broad, separately rounded at the apex; coarsely punctate-striate, the interstices rugose. Rostral canal broad and deep, extending into the anterior portion of the metasternum. Legs short; femora unarmed, shallowly sulcate beneath.

Length $2\frac{4}{5}$ – $2\frac{7}{8}$, breadth $1\frac{2}{5}$ millim.

Hab. PANAMA, Caldera in Chiriqui (*Champion*).

One specimen. The unarmed femora distinguish *E. ornatus* from most of the similarly-marked Central-American forms.

14. *Eulechriops muticus*, sp. n. (Tab. VII. fig. 21.)

Subovate, rufo-piceous, the under surface and femora blackish, the antennæ, rostrum, apical margin of the elytra, tibiae, and tarsi ferruginous; the prothorax with three small transverse patches at the base, and the elytra with a short streak at the base of each of the interstices 2–4, another at the middle of the suture, another at its apex, and a small spot at the middle of the eighth interstice, clothed with small, narrow, white, piliform scales; the rest of the vestiture very fine, sparse, and inconspicuous. Eyes moderately large, contiguous in front. Rostrum strongly arcuate, finely punctate. Joint 2 of the funiculus shorter than 1. Prothorax short, rapidly narrowing from the base, subconical; densely, finely

punctate. Elytra broad, rounded-triangular, separately rounded at the tip; punctato-sulcate, the interstices convex, rugulose, not wider than the shallowly punctured, deep striæ. Rostral canal broad, extending into the anterior portion of the metasternum. Legs short; femora unarmed, sulcate beneath. Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Caldera in Chiriqui (*Champion*).

One specimen, doubtless immature. Shorter than *E. ornatus*, the prothorax rapidly narrowing from the base and much less rugose, the elytra sulcate, with smoother interstices, the legs more slender, the vestiture finer, the elytral spots smaller, fewer in number, and differently placed. *E. erythroleucus*, Faust, from Venezuela (the type of which I have seen *), is an allied form.

15. *Eulechriops perpusillus*, sp. n.

Ovate, shining, ferruginous, the head and under surface piceous; the head, the prothorax with the sides, flanks, apex, and an interrupted median vitta, the elytra with various interrupted lines (one on each interstice at the base), and the under surface in part, clothed with coarse narrow white scales, the prothorax with short erect brown scales on the disc. Eyes large, subcontiguous. Rostrum feebly arcuate, about as long as the prothorax, rugulose punctate and squamose in its basal half, smooth at the tip. Joint 2 of the funiculus much shorter than 1. Prothorax short, somewhat gibbous, narrowing from the base, densely punctate. Scutellum scarcely visible. Elytra much wider than the prothorax, narrowing from the base; deeply punctate-striate, the interstices punctulate and rather convex. Rostral canal deep, smooth, extending into the vertical anterior face of the metasternum. Legs short; femora unarmed, deeply sulcate beneath; tibiæ and tarsi slender.

Length $1\frac{1}{2}$, breadth $\frac{5}{8}$ millim.

Hab. BRITISH HONDURAS, Rio Hondo (*Blancaneaux*).

One specimen. This minute insect may be known by the somewhat gibbous prothorax, deep rostral canal, short legs, and deeply sulcate, unarmed femora. The form and position of the eyes separate *E. perpusillus* from all the Barina.

16. *Eulechriops seriatus*, sp. n. (Tab. VII. fig 30.)

Subovate, reddish-brown, the antennæ, rostrum, and legs ferruginous; the prothorax with a spot at each hind angle, extending forwards along the flanks beneath, the elytra with the suture, a short streak on the second interstice below the base, a spot on the shoulder in front, and another at the sides beyond the middle, and the mesothoracic epimera, somewhat thickly clothed with whitish scales, the elytral interstices each with a line of finer, ochreous, hair-like scales; the rest of the vestiture of the prothorax very fine, that of the under surface and legs whitish. Rostrum arcuate, moderately stout, rugulose and carinate at the base, and almost smooth thence to the tip. Eyes large, subcontiguous. Prothorax transverse, rounded at the sides anteriorly, constricted and narrowed in front; densely, finely punctate,

* Dr. Heller has also been kind enough to communicate one of the types (a ♀) of *Isotrachelus brunneus*, Faust (Stett. ent. Zeit. 1896, p. 94). The genus is synonymous with *Microcleogonus*, described in the preceding volume of this series [Coleopt. iv. 4, pp. 458, 459, t. 22. figs. 17, 17 a-c (♂) (1905)], and the latter name must be sunk. *I. brunneus* is very like *Microcleogonus tibialis*, but has a longer and more slender rostrum, less deeply impressed elytral striæ, and closer and finer vestiture. I omitted to note (*loc. cit.* p. 459) that the ♀ of *M. tibialis* has a longer, straighter, and smoother rostrum than the ♂, and that the fifth ventral segment has a closely punctate depressed area in the middle in the latter sex. Faust refers *Isotrachelus* to the "Isorhynchides" of Lacordaire; but the genus seems to me to be closely related to *Cleogonus* of the group "Cryptorrhynchina," where it is placed in this work.

and finely carinate. Elytra shining, deeply punctate-striate, the interstices rugulosely punctate, slightly wider than the striæ. Rostral canal deep, closed behind, entering the declivous anterior portion of the metasternum. Femora sulcate beneath, unarmed.

Length $2\frac{2}{5}$, breadth $1\frac{1}{3}$ millim.

Hab. MEXICO, Cerro de Plumas (*Höge*).

One specimen. Not unlike the Venezuelan *E. erythroleucus*, Faust, but larger, with an uninterrupted line of yellowish hair-like scales down each elytral interstice, and the denser, whitish, sutural streak widened below the base, the elytra also with a white spot at the sides beyond the middle, the rostrum stouter, &c.

17. *Eulechriops longipennis*, sp. n. (Tab. VII. figg. 22, 22 a.)

Oblong, somewhat convex above, rufo-piceous; the prothorax with a transverse space at each angle and a broad interrupted median vitta, the elytra with the base, apex, suture, and an interrupted postmedian fascia, the entire under surface, and legs, thickly clothed with small, narrow, flavo-cinereous scales, the rest of the upper surface almost bare. Head finely punctate; eyes moderately large, narrowly separated; rostrum arcuate, rather stout, closely punctate at the base; joint 2 of the funiculus shorter than 1. Prothorax transverse, strongly rounded at the sides, constricted and narrowed in front; densely, finely punctate, and carinate. Elytra comparatively long, a little wider than the prothorax, blunt at the tip; with sinuous, finely punctured striæ, separated by broad, flat, rugulose interstices. Beneath closely punctate. Rostral canal deep, extending into the anterior portion of the metasternum. Legs short; femora unarmed.

Length 4, breadth $1\frac{9}{10}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen, perhaps a little worn. An isolated form, recognizable by its oblong shape, fine sculpture, trifasciate elytra, &c. The elytra are relatively narrower than in *E. nigrolineatus*, being very little wider than the prothorax.

18. *Eulechriops elongatus*, sp. n. (Tab. VII. fig. 23.)

Oblong, narrow, nigro-piceous, the antennæ, rostrum, anterior portion of the prothorax, elytra, and legs obscure ferruginous; the prothorax with three small patches in front and three at the base, the elytra with an elongate patch on the anterior portion of the suture, another at its apex, the base, and a broad space on the outer part of the disc beyond the middle, the under surface, and legs, clothed with small, narrow, flavo-cinereous scales, the rest of the upper surface almost bare. Eyes moderately large, narrowly separated. Rostrum stout, feebly arcuate, sparsely, minutely punctate. Joint 2 of the funiculus shorter than 1. Prothorax transverse, rounded at the sides, narrowed and constricted in front; densely, finely punctate, and with a short median carina. Elytra a little wider than the prothorax, rather long, rounded at the tip; punctate-striate, the interstices shining, punctulate, and somewhat convex. Rostral canal deep, extending into the anterior portion of the metasternum. Legs short, rather slender; femora unarmed.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim.

Hab. MEXICO, Yautepec in Morelos (*Höge*).

One specimen. Very like a N.-American insect sent me by Mr. Wickham under the name *Copturus minutus*, Lec.*, but with the rostral canal extending to the

* The type of the genus *Zygomicrus*, Casey, who places it in his table amongst the genera with the "mesosternum not excavated." The insect sent me by Mr. Wickham has a deep mesosternal cavity.

anterior portion of the metasternum, the eyes less approximate in front, the prothorax more rounded at the sides, &c. Smaller and narrower than *E. longipennis*, the eyes smaller, the elytral markings different, the interstices smoother.

19. *Eulechriops cinerascens*, sp. n.

Subovate, nigro-piceous, the antennæ, rostrum, apical margin of the elytra, tarsi, and apices of the tibiae ferruginous; the vestiture fine, somewhat sparse, cinereous, condensed into a narrow line along each elytral interstice, the metasternal side-pieces with a denser whitish patch. Eyes rather large, contiguous in front. Rostrum arcuate, rugulose at the base. Joint 2 of the funiculus much shorter than 1. Prothorax transverse, slightly rounded at the sides, narrowed in front; densely, finely punctate. Elytra wider than the prothorax, blunt at the tip; punctate-striate, the interstices narrow, not wider than the striae, rugose. Rostral canal deep, reaching the anterior face of the metasternum, margined posteriorly. Legs short; femora unarmed.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. This insect resembles a small *Ceuthorrhynchus*; it has the vestiture of the upper surface uniformly cinereous and arranged in narrow lines on the elytra.

20. *Eulechriops cylindricollis*, sp. n. (Tab. VII. fig. 24.)

Elliptic, rather convex, narrow, opaque, black, the basal half of the antennæ, the apical margin of the elytra, and the tips of the tarsi ferruginous; the elytra with a narrow sinuous fascia at the base and an oblique streak at the sides below it, the mesothoracic epimera, metasternum, and abdomen clothed with coarse white scales; the punctures of the prothorax each bearing a small, narrow, appressed white scale, and the apical two-thirds of the elytra clothed with long, white, hair-like scales; the vestiture of the rest of the surface, and of the legs also, white. Eyes moderately large, contiguous in front, narrowly separated above. Rostrum short, stout, rugulose and finely carinate in its basal half, and finely punctate thence to the tip. Joints 1 and 2 of the funiculus equal in length, 6 and 7 strongly transverse. Prothorax transverse, subcylindrical, slightly narrowed in front; closely, finely punctate, and obsolete carinate. Elytra oblong-cordate, somewhat rounded at the tip; deeply punctate-striate, the interstices rugulose and almost flat. Prosternum with a long conical tubercle behind each anterior coxa, similar to that on the coxa itself. Mesosternum transversely depressed, the depression limited on each side by an oblique ridge. Metasternum flattened and declivous in front. Legs rather long; femora unarmed, sulcate at the apex only beneath, the posterior pair reaching as far as the apex of the abdomen.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. A remarkably distinct form, recognizable by its oblong-elliptic form, subcylindrical prothorax, and peculiar elytral markings, the upper surface clothed with three different kinds of white scales, the prosternum tuberculate behind the anterior coxæ.

21. *Eulechriops scutulatus*, sp. n. (Tab. VII. fig. 25.)

Oblong-ovate, robust, rather shining, black; a spot on each side of the prothorax at the base, the basal margin, a rather large rounded scutellar patch on the elytra, a smaller spot on the suture at the apex, a spot on the mesothoracic epimera, the metasternum, a patch on the first ventral segment, a transverse fascia at the apex of the second, and the sides of the segments 3-5, clothed with coarse white scales. Head closely punctate; eyes moderately large, subcontiguous in front, separated above by a rather broad

lanceiform space; rostrum closely, rather coarsely punctate in its basal half, without median carina; joint 2 of the funiculus about half the length of 1, the club rather narrow. Prothorax transverse, convex, rounded at the sides, narrowed in front; densely punctate. Elytra a little wider than the prothorax, truncate at the apex, the humeri not prominent; punctato-sulcate, the interstices flattened and almost smooth, narrow on the disc, broad towards the sides. Mesosternum broad, declivous, unimpressed. Intercoxal portion of the metasternum broad, flattened. Ventral segment 1 flattened and rugulose punctate in the middle; 2 abruptly declivous posteriorly. Legs short; femora unarmed, shallowly sulcate beneath.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (σ .)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. This species has the general facies of *E. melancholicus*, &c., but the mesosternal impression is wanting and the eyes are well-separated above. The elytral interstices are flattened and almost smooth. The patches of coarse white scales are sharply defined, above and beneath.

22. *Eulechriops sexnotatus*, sp. n. (Tab. VII. fig. 26.)

Oblong-ovate, rather convex above, black, the antennae, apical margin of the elytra, and tips of the tarsi ferruginous; the prothorax with a spot at each hind angle, the elytra with a spot on the suture below the base, a smaller one towards the tip, and a spot on each side beyond the middle, and the under surface in great part, clothed with coarse whitish scales, the rest of the upper surface almost bare, the legs with whitish scales. Eyes moderately large, subcontiguous. Rostrum stout, arcuate, rugulose punctate and finely carinate at the base. Joint 2 of the funiculus shorter than 1. Prothorax transverse, rounded at the sides, constricted and narrowed in front; densely, finely punctate. Elytra much wider than the prothorax, rounded at the tip, the humeri rather prominent; punctato-sulcate, the interstices not wider than the striae, irregularly uniseriate-punctate. Mesosternal depression shallow, transverse, the broad metasternum declivous in front. Legs short and stout; femora unarmed, shallowly sulcate beneath, the intermediate and posterior knees rather sharp.

Length $2\frac{3}{4}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen, rather worn. Very like *E. scutulatus*, but with the elytra more rounded at the sides and with a white lateral spot, the interstices less flattened and not so smooth, the prothorax less coarsely punctate, the eyes much more approximate above, the broad mesosternal depression distinct, the second joint of the funiculus longer. We have here two closely related forms, one with (*E. sexnotatus*) and the other without (*E. scutulatus*) distinct mesosternal excavation, showing that this character cannot always be relied upon for generic separation.

23. *Eulechriops albolineatus*, sp. n. (Tab. VII. fig. 27.)

Subelliptic, black, the antennae and the apical margin of the elytra obscure ferruginous; above sparsely, the legs and under surface thickly, clothed with rather coarse white scales, the scales on the prothorax condensed into three vittae (the two outer ones widening inwards towards the base) and those on the elytra into an interrupted line on each interstice. Eyes moderately large, narrowly separated in front. Rostrum rugulose punctate in its basal half, not carinate. Joint 2 of the funiculus about half the length of 1. Prothorax a little broader than long, narrowed and feebly constricted in front; densely punctate. Elytra considerably wider than the prothorax, separately rounded at the tip; deeply punctate-striate, the interstices flattened and rugose. Mesosternum very slightly depressed, the depression

limited on each side by a faint oblique ridge. Intercoxal portion of the metasternum broad, flattened.

Legs short, stout; femora unarmed, sulcate beneath; tarsal claws very small.

Length $2\frac{1}{8}$, breadth $1\frac{1}{8}$ millim.

Hab. MEXICO, Tapachula in Chiapas (*Höge*).

One specimen. Near *E. scutulatus*, but with the prothorax trivittate, and the elytra narrowly interruptedly lineate with white, the interstices of the latter rugose and the apices separately rounded, the mesosternum very shallowly transversely depressed, the eyes more approximate above.

24. *Eulechriops ductilis*, sp. n. (Tab. VII. fig. 28.)

Oblong-elliptic, black, the antennæ, tip of the rostrum, apical margin of the elytra, tibiæ, and tarsi ferruginous; the prothorax with a large spot on each side at the base and a small one in front of the scutellum, the elytra with the suture or an oblong spot at its base and apex, a streak at the base of the second interstice, and a spot at the sides beyond the middle, and the under surface, thickly clothed with coarse white scales; the rest of the vestiture finer, ochraceous or brown, the elytra with a few coarser pallid scales along the base of each interstice, the legs with narrow white scales. Eyes moderately large, subcontiguous in front. Rostrum rugulosely punctate and feebly carinate, smoother at the tip. Joint 2 of the funiculus slightly shorter than 1. Prothorax a little broader than long, gradually narrowing forwards, constricted in front; densely punctate. Elytra deeply punctate-striate, the interstices narrow and rugose. Rostral canal deep, just entering the abruptly declivous metasternum. Legs short; femora without trace of tooth, sulcate beneath.

Var. The disc of the elytra ferruginous to beyond the middle.

Length $2-2\frac{1}{2}$, breadth $1-1\frac{1}{4}$ millim.

Hab. MEXICO, Chilpancingo (*H. H. Smith*); GUATEMALA, Dueñas (*Champion*).

Three specimens from Mexico and one (the variety) from Guatemala. In this insect the coarse oval white scales on the elytra are clustered into a sutural stripe (sometimes reduced to two oblong spots) and a spot at the sides, and those on the prothorax into three spots at the base, the tibiæ and tarsi are wholly ferruginous, and the femora are unarmed*. From *E. septemnotatus* it may be known by the unarmed anterior femora.

25. *Eulechriops pygmæus*, sp. n.

Subovate, black, the antennæ, rostrum, apical margin of the elytra, tibiæ, and tarsi ferruginous or rufo-testaceous; the prothorax with a spot on each side at the base and an incomplete median vitta, the elytra with a short streak on each interstice at the base, an elongate streak on the suture towards the apex, and a spot on each side beyond the middle, and the under surface in great part, clothed with coarse white scales, the rest of the vestiture of the upper surface sparse, fine, and brownish, that of the legs white. Eyes moderately large, contiguous in front. Rostrum arcuate, rugulose at the base. Joint 2 of the funiculus much shorter than 1. Prothorax short, densely punctate, and with a short median carina. Elytra wider than the prothorax, rounded at the tip; deeply punctate-striate, the interstices narrow, convex, and rugose. Rostral canal rather deep, not extending beyond the mesosternum. Legs short; femora sulcate beneath, unarmed.

Length $1\frac{3}{4}$, breadth 1 millim.

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*), Coban (*Conradt*).

* In the British Museum there is a rubbed specimen from "Mexico" perhaps belonging to the same species, but it has the rostrum more rugose, the prothorax carinate, and the tibiæ infuscate, and the lateral white spot on the elytra is wanting.

Two specimens, both from the Atlantic slope. Smaller and less elongate than *E. ductilis*, the prothorax more transverse and with a short conspicuous median carina. In one example the white scales on the elytra show a tendency to form two transverse interrupted fasciæ, as well as an interrupted sutural stripe.

26. *Eulechriops nitidus*, sp. n. (Tab. VII. figg. 29, 29 a.)

Ovate, rather convex above, shining, black, the antennæ, tip of the rostrum, apical margin of the elytra, and tarsi ferruginous; the prothorax with a spot at each hind angle, the elytra with a small transverse scutellar patch, a spot at the middle of the suture, and a short streak at the apex, and the mesothoracic epimera, thickly clothed with coarse white scales, the rest of the upper surface almost bare; the under surface and legs rather sparsely, the second ventral segment thickly, clothed with white scales. Eyes moderately large, oval, contiguous. Rostrum arcuate, finely punctate, rugulose at the base. Joint 2 of the funiculus much shorter than 1. Prothorax transverse, rounded at the sides, much narrowed in front; closely, finely punctate, the punctures separate one from another, without trace of median carina. Elytra convex, wider than the prothorax, blunt at the tip; punctato-sulcate, the interstices flat and almost smooth, those near the suture not wider than the striæ. Mesosternal depression transverse, rather deep. Posterior coxæ widely separated. Legs very short; femora unarmed, sulcate beneath, the posterior pair not reaching beyond second ventral suture. Length $1\frac{3}{4}$, breadth 1 millim.

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. A minute, shining, convex form, with three white patches on the suture of the elytra and one at each hind angle of the prothorax, the elytral interstices almost smooth, the legs very short, the rostral canal not extending beyond the mesosternum.

27. *Eulechriops coruscus*, sp. n.

Ovate, convex, glossy-black, the apical margin of the elytra and the tips of the tarsi ferruginous; the elytra with a short streak of pure white scales at the base of the second interstee and another at the middle of the suture, the seriate punctures also bearing very minute whitish scales; the under surface and legs sparsely clothed with small white scales. Head very finely, somewhat sparsely punctate; eyes moderately large, contiguous; rostrum rather slender, feebly arcuate, about as long as the prothorax, closely punctate at the base and almost smooth thence to the tip; joint 2 of the funiculus shorter than 1. Prothorax convex, broader than long, constricted in front, the sides arcuately converging from the base; closely, finely punctate. Elytra much broader than the prothorax, rapidly narrowing from a little below the base, the apices narrowly explanate and broadly subtruncate; deeply punctato-sulcate, the interstices broad, flat, and almost smooth. Beneath closely punctate; mesosternum subvertical, broadly flattened; metasternum declivous in front, unimpressed; anterior coxæ each with a small conical prominence; intermediate coxæ very widely separated; legs short; femora sulcate beneath, unarmed, the posterior pair reaching the second ventral suture.

Length 3, breadth $1\frac{1}{8}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Near *E. nitidus*, but much larger; the prothorax glabrous above; the elytra narrowly explanate at the apex, the interstices broad; the mesosternum very broadly flattened, almost unimpressed.

28. *Eulechriops lævirostris*, sp. n. (Tab. VIII. fig. 1.)

Subovate, piecous, the antennæ, rostrum, and tarsi ferruginous; the prothorax with a transverse patch at each angle (the anterior ones extending down the flanks and the posterior ones connected across the base), and

the elytra with a large triangular scutellar patch (extending outwards to the humeri), the suture broadly thence to the tip, and a common transverse fascia beyond the middle, clothed with rather long, piliform, whitish scales, the rest of the vestiture of the upper surface sparser and darker, that of the under surface and legs whitish. Eyes moderately large, contiguous in front. Rostrum feebly arcuate, slender, short, smooth and shining, except at the base, the antennæ inserted far behind the middle, joint 2 of the funiculus much shorter than 1. Prothorax transverse, strongly rounded at the sides, narrowed in front; densely, finely punctate, and subcarinate. Elytra a little wider than the prothorax, rounded-subquadrate, blunt at the tip; shallowly punctate-striate, the interstices rugulose, flat, and much broader than the narrow striæ. Mesosternal excavation narrow, the metasternum unimpressed. Legs very short; femora unarmed, shallowly sulcate beneath, the posterior pair reaching the second ventral suture.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Smaller and less elongate than *E. longipennis*, the rostrum shorter, smoother, and more slender, the canal not impinging on the metasternum, the legs shorter, the femora with a longer sulcus beneath. The broader prothorax, with strongly rounded sides, the narrower and shallower elytral striæ, the shorter rostral canal, &c., separate *E. lævirostris* from *E. brevipes*. The antennæ are inserted rather near the base of the rostrum.

29. *Eulechriops leucospilus*, sp. n. (Tab. VII. fig. 31.)

Elliptic, rather narrow, black, the antennæ, apical margin of the elytra, and tarsi ferruginous; the prothorax with a large spot on each side at the base and sometimes a small one on the median lobe, the elytra with a common A-shaped mark below the base, a transverse patch at the sides before the middle, a large spot on the suture beyond the middle, and the apex, and the under surface in great part, thickly clothed with coarse white scales, the elytra also with scattered ochreous scales, which become more crowded on the basal portion of each interstice, the rest of the vestiture of the upper surface fine and inconspicuous, that of the legs white. Eyes moderately large, subcontiguous in front. Rostrum short, stout, arcuate, rugulose punctate and subcarinate at the base. Funiculus stout, joint 2 about half the length of 1. Prothorax broader than long, somewhat rounded at the sides anteriorly, constricted and narrowed in front; densely, finely punctate. Elytra wider than the prothorax, rounded at the tip; deeply punctate-striate, the interstices narrow, convex, rugose. Mesosternum vertical, slightly depressed. Legs short; femora unarmed.

Length $2\frac{2}{3}$, breadth $1\frac{1}{4}$ millim.

Hab. GUATEMALA, Ducñas (*Champion*).

Two specimens. The short stout rostrum and funiculus, the shallow mesosternal excavation, and the peculiar elytral markings distinguish *E. leucospilus*. The white scales on the elytra are condensed into a common, interrupted, angulate fascia below the base and a large spot on the suture beyond the middle; and the ochreous ones into a transverse band at the base, much as in *Lechriops flavofasciatus*.

30. *Eulechriops plagiatus*, sp. n. (Tab. VII. fig. 32.)

Ovate, robust, shining, nigro-piceous, the upper surface in great part ferruginous (a very large subtriangular blackish space at the sides of the elytra excepted), the rostrum, antennæ, knees, tibiae, tarsi, and abdomen also ferruginous; the vestiture rather coarse and close: the head with a fulvous line around the eyes; the prothorax fulvous, with a large rounded patch on each side at the base, and an interrupted median line, yellowish-white; the elytra with the dark lateral spaces, which are connected near the middle by an interrupted fascia, clothed in great part with black scales, the apex broadly and the base fulvous, and the suture in part, and an interrupted undulate fascia before the middle, white; the under surface clothed

with coarse yellowish-white scales, the ventral segments 3 and 4 with a transverse fulvous space at the middle; the vestiture of the legs whitish and fulvous, the posterior femora with a dark space towards the apex. Eyes moderately large, narrowly separated. Rostrum stout, carinate and rugulose at the base. Joints 1 and 2 of the funiculus equal in length. Prothorax transverse, subconical, constricted in front; densely, finely, rugulosely punctate, and subcarinate. Elytra rather convex, flattened at the base, rounded at the sides, blunt at the tip; deeply punctate-striate, the interstices almost flat. Mesosternal excavation shallow, trapezoidal, the metasternum declivous in front. Anterior coxal prominences pointed. Legs short; femora unarmed, the posterior pair compressed.

Length $3\frac{1}{2}$, breadth $1\frac{9}{10}$ millim.

Hab. GUATEMALA, Dueñas (*Champion*).

One specimen. An isolated form. The disc of the prothorax and the base and apex of the elytra are clothed with fulvous scales, the triangular black lateral patches on the elytra are connected across the middle, and the rounded yellowish-white spot on each side of the base of the prothorax is sharply defined.

31. *Eulechriops maculicollis*, sp. n. (Tab. VII. fig. 33.)

Ovate, flattened above, shining, nigro-piceous, the dorsal surface of the elytra, the apex of the abdomen, the antennæ, rostrum, and legs ferruginous; the prothorax with a very large, rounded, dense patch of white scales on each side (extending from the base to near the apex), and the elytra with two spots on the outer part of the disc also white, the rest of the vestiture of the upper surface sparse, ochreous, and piliform, that of the under surface coarse, close, and white, the legs with fine, whitish, piliform scales. Eyes large, subcontiguous. Rostrum arcuate, rugulosely punctate at the base. Joints 1 and 2 of the funiculus subequal in length. Prothorax short, narrowing from near the base, constricted in front; densely, finely punctate and obsoletely carinate. Elytra broad, rounded at the apex, flattened on the disc; punctate-striate, the interstices narrow, feebly convex, and rugulose. Mesosternal excavation broad and rather deep, the earinæ sharp, the metasternum simply declivous in front. Legs short, rather slender; femora unarmed, the posterior pair reaching a little beyond the second ventral suture.

Length $2\frac{1}{2}$, breadth $1\frac{2}{5}$ millim.

Hab. MEXICO, Jalapa (*Höge*).

One specimen, somewhat abraded beneath. Distinguishable by the very large dense white patch on each side of the prothorax, the flattened, rufescent elytra, with two small white spots on the outer margin, and the reddish legs.

32. *Eulechriops pusillus*, sp. n. (Tab. VIII. figg. 2, 2 a.)

Short ovate, rather convex above, black, the antennæ, rostrum, elytra (an elongate streak on the basal portion of the suture excepted), tibiæ, and tarsi ferruginous or testaceous; the vestiture whitish, in one specimen intermixed with ochreous above, rather close, and on the elytra mainly condensed into various transverse patches and a broad interrupted sutural stripe, the prothorax with two bare spaces on the disc. Eyes moderately large, almost contiguous in front. Rostrum short, stout, arcuate, slightly widened at the tip, finely punctate, rugose at the base. Joint 2 of the funiculus much shorter than 1. Prothorax transverse, rounded at the sides, constricted and much narrowed in front; densely, finely punctate. Scutellum scarcely visible. Elytra comparatively short, much wider than the prothorax, rounded at the apex; deeply punctate-striate, the interstices convex, a little wider than the striae, punctulate. Mesosternal excavation broad, trapezoidal, the metasternum declivous in front. Legs very short and stout; femora unarmed, the posterior pair not reaching beyond the second ventral suture, the intermediate and posterior pairs shallowly sulcate beneath; tarsal claws minute.

Length 2, breadth $1\frac{1}{10}$ – $1\frac{1}{5}$ millim.

Hab. GUATEMALA, Dueñas and Capetillo (*Champion*).

Two specimens. A minute, short-ovate form, with rufescent elytra (a streak at the base of the suture excepted), and their vestiture mainly condensed into interrupted transverse fasciæ, the legs very short and stout.

33. *Eulechriops conicicollis*, sp. n. (Tab. VIII. figg. 3, 3 *a*, *b*.)

Rhomboidal, obscure ferruginous, the elytra each with an oblique dark streak near the suture before the middle (the two streaks forming a common $\vee$ -shaped mark); thickly clothed with small scales: the head, the prothorax with a broad sharply-defined vitta on each side (extending halfway down the flanks) and a narrow median line, the elytra with two irregular fasciæ (one below the base and another at the middle), the humeri, and suture, the under surface, and legs, ochreous or flavo-cinereous, the seriate elytral punctures each with a piliform whitish scale, the rest of the vestiture of the upper surface reddish-brown or ferruginous. Eyes moderately large, contiguous. Rostrum comparatively slender, curved, about as long as the head and prothorax, sparsely punctate, a little smoother in the ♀, the antennæ inserted near the base, the funiculus slender, joints 1 and 2 subequal in length, 4 longer than 3. Prothorax broader than long, conical; densely, finely punctate, and feebly carinate. Elytra one-half wider than the prothorax, rounded-triangular; punctate-striate, the interstices broad, rugose, and feebly convex. Rostral canal very deep, reaching as far as the posterior margin of the middle coxæ, the mesosternal excavation broad. Legs short; femora unarmed.

Length 3-3½, breadth 1½-2 millim. (♂ ♀.)

Hab. MEXICO, Toxpan (*Sallé*), Jalapa (*Höge*); GUATEMALA, San Gerónimo (*Champion*).

Many specimens from San Gerónimo, two only from Mexico. A species with the rostrum comparatively long and slender, and the antennæ inserted close to its base, a conical prothorax, and a very deep rostral canal. The dark $\vee$ -shaped mark on the elytra is preceded and followed by several flavo-cinereous spots, which are included in the pallid fasciæ.

34. *Eulechriops sibinioides*, sp. n.

Smaller than *E. conicicollis*, the elytra narrower and without the $\vee$ -shaped darker mark on the disc, the vittæ on the prothorax and the pallid elytral fasciæ less sharply defined, the prothorax slightly rounded at the sides posteriorly, the rostrum more slender, that of the ♀ smooth.

Length 2½-2¾, breadth 1¾-1½ millim. (♂ ♀.)

Hab. GUATEMALA, Capetillo (*Champion*).

Two specimens, apparently distinct from *E. conicicollis*. The rostral canal does not extend beyond the middle coxæ in either sex.

35. *Eulechriops tenuirostris*, sp. n.

Very like *E. conicicollis*, but with the common $\vee$ -shaped dark mark on the elytra reduced to a short streak on the second interstice; the eyes a little smaller; the rostrum more slender, that of the ♀ straighter, longer than the head and prothorax, and almost smooth; joint 2 of the funiculus a little shorter than 1, 4 longer than 3; the prothorax slightly rounded at the sides posteriorly, the vittæ less sharply defined; the elytra blunter at the apex, the pallid fasciæ reduced to a few spots; the rostral canal of the ♀ extending beyond the middle coxæ.

Length 2½-3, breadth 1½-1⅞ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui, Peña Blanca (*Champion*).

Seven specimens. The rostrum of the female is longer, straighter, and more slender than in the same sex of *E. sibinioides*. The elytra are as broad as in *E. conicicollis*.

36. *Eulechriops filirostris*, sp. n. (Tab. VIII. fig. 4, ♀.)

Rhomboidal, obscure ferruginous, darker beneath, thickly clothed with small, narrow, yellowish-white scales, the prothorax with two faint narrow vittæ on the disc, and the elytra with a transverse fascia before the middle and a patch on the disc towards the apex, ochreous or brown. Eyes comparatively small, contiguous. Rostrum feebly curved, slender, longer than the head and prothorax, almost smooth. Joint 2 of the funiculus shorter than 1, 4 slightly longer than 3. Prothorax conical, densely, finely punctate, and obsoletely carinate. Elytra broad, rounded-triangular; punctate-striate, the interstices broad and rugose. Rostral canal reaching beyond the middle coxæ. Femora unarmed.

Length $2\frac{1}{3}$, breadth $1\frac{1}{3}$ millim. (♀.)

Hab. GUATEMALA, San Gerónimo (*Champion*).

One specimen. Smaller than *E. conicicollis*, the eyes not so large, the rostrum (♀) slender and reaching beyond the middle coxæ, the dark vittæ on the prothorax reduced to sinuous lines, the elytra with a straight dark fascia before the middle. The rostrum is long and slender, as in the female of *E. tenuirostris*, from which the present insect differs in its less robust build, the straighter sides of the prothorax, &c.

37. *Eulechriops angusticollis*, sp. n. (Tab. VIII. fig. 5, ♀.)

Subrhomboidal, castaneous; thickly clothed with small narrow scales: the head, the prothorax with the sides broadly and a narrow median vitta, the elytra with a large, triangular scutellar patch (extending outwards to the humeri and running down the suture to near the apex), a transverse row of spots just beyond the middle, and the apical margin, the under surface, and legs, ochreous or yellowish-white, the rest of the vestiture of the upper surface brown. Eyes rather small, contiguous. Rostrum curved, depressed at the base, moderately slender, longer than the head and prothorax, minutely punctate, the antennæ inserted near the base, joint 2 of the funiculus much shorter than 1, 4 longer than 3. Prothorax conical, broader than long, slightly constricted at the middle; densely punctate and obsoletely carinate. Elytra rather long, nearly twice as wide as the prothorax, rounded-triangular; punctate-striate, the interstices broad and rugulose. Rostral canal reaching the middle of the metasternum, widened at its point of termination. Legs short; femora unarmed.

Length $3\frac{1}{10}$, breadth $1\frac{3}{4}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen, in perfectly fresh condition. Near *E. tenuirostris*, but with a narrower prothorax and longer elytra, the latter with a line of spots across the middle and a large triangular scutellar patch yellowish-white; the rostrum stouter, depressed at the base, and more curved; the rostral canal shallower, and widened at its apex.

MACROLECHRIOPS, gen. nov.

Anterior and intermediate coxæ each with a flattened conical prominence, the prosternum also with a small conical prominence behind each coxa; mesosternum deeply excavate, extending broadly backwards between the middle coxæ, the oblique laminæ prominent; metasternum excavate in front; legs short, the femora and tibiæ broad and compressed, the femora unarmed beneath and without external carina, the intermediate knees angularly dilated within, the tarsi slender, the claws long; antennæ inserted at some distance from the base of the rostrum; prothorax short, arcuato-carinate; scutellum visible; ventral segments rapidly ascending.

The single species referred to this genus approaches *Machærocnemis* and *Copturosomus*, but it cannot be included in either of them, as defined by Heller. The presence of a

flattened conical prominence on the intermediate, as well as on the anterior, coxæ is a character I have not observed in any other Zygopid.

1. *Macrolechriops spinicoxis*, sp. n. (Tab. VIII. figg. 6, 6 a, b.)

Subovate, dull, piecous, the antennæ, tip of the rostrum, apical margin of the elytra, and tarsi ferruginous; the vestiture rather sparse, ochreous and whitish, denser and coarser beneath, the prothorax with an oblong ochreous spot at the middle of the base, the elytra with a few widely scattered coarse scales and a short streak on the suture beyond the middle whitish, their basal half very sparsely squamose, the second intersticio with a short blackish streak at the middle, the femora subannulate with fuscous. Eyes large, subcontiguous. Rostrum arcuate, rather long, rugulose punctate and subcarinate at the base. Joints 1 and 2 of the funiculus equal in length. Prothorax transverse, narrowed and constricted in front; densely, finely punctulate, and sharply arcuate-carinate. Elytra broad, conjointly rounded at the apex; punctate-striate, the interstices rugulose and somewhat convex. Metasternum densely squamose, the excavation included.

Length $3\frac{3}{4}$, breadth 2 millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One worn specimen. The unarmed femora, broad tibiæ, deeply excavate mesosternum, shorter second joint of the funiculus, &c., separate *M. spinicoxis* from *Copturus centralis* and *C. exaratus*, both of which have a somewhat similar facies.

PSOMUS.

Psomus, Casey, Ann. N. York Acad. Sci. vi. p. 458 (1892); ix. p. 667.

This genus is based upon a single minute N.-American Zygopid, with a flattened abdomen, with segments 2-4 subequal in length, a narrow, conical prothorax, very convex, subtriangular elytra, and unarmed femora. The three species now added from Central America, each represented by a single example, are perfectly congeneric with *P. politus*, Casey, and I have seen other unarmed forms from South America in the British Museum that will have to be included in the same genus.

1. *Psomus caseyi*, sp. n.

Subrhomboidal, very convex, shining, black, the antennæ, rostrum, tibiæ, and tarsi rufo-testaceous; the intraocular portion of the head, the rostrum, the prothorax with the flanks and an irregular patch on each side at the base above, the scutellum, the elytra with several small spots placed transversely across the disc beyond the middle and another near the apex, and the mesothoracic side-pieces, clothed with rather coarse white scales, the rest of the upper surface with a few scattered, decumbent, brownish hairs; the vestiture of the femora white. Head finely punctate. Prothorax conical, closely punctate, except along the smooth median line. Elytra very convex, much wider than the prothorax, rapidly narrowing from about the basal third; deeply and rather coarsely punctate-striate, the interstices somewhat convex and faintly punctulate.

Length $1\frac{1}{2}$, breadth $\frac{7}{8}$ millim.

Hab. GUATEMALA, Dueñas (*Champion*).

Very like the N.-American *P. politus*, Casey (for an example of which we are indebted to Mr. Wickham), but with small scattered patches of coarse white scales on

the prothorax, scutellum, and elytra, the elytral striæ broader, deeper, more coarsely punctate.

2. **Psomus quadrinotatus**, sp. n. (Tab. VIII. figg. 7, 7 a.)

Subrhomboidal, very convex, shining, piceous, the eyes black, the rostrum, antennæ, tibiæ, and tarsi flavo-testaceous; the prothorax with a large triangular space on each side, extending down the flanks, the scutellum, a large subtriangular spot beyond the middle of each elytron, and a patch on the mesosternal side-pieces, densely clothed with coarse white scales, the rest of the vestiture of the upper surface brownish, sparse, fine, and hair-like, that of the rostrum, legs, and under surface coarse and white. Head finely punctate. Prothorax conical, closely punctate. Elytra finely punctate-striate, the interstices uniseriate-punctate and almost flat.

Length $1\frac{9}{10}$, breadth 1 millim.

Hab. PANAMA, Bugaba (*Champion*).

The large dense white spot on each side of the prothorax and on the outer part of the disc of each elytron, the closer hair-like vestiture on the rest of the upper surface, and the flattened uniseriate-punctate elytral interstices readily distinguish *P. quadrinotatus* from *P. caseyi* and *P. politus*.

3. **Psomus violaceus**, sp. n. (Tab. VIII. fig. 8.)

Subrhomboidal, very convex, shining, black, the elytra violaceous, the antennæ, tibiæ, and tarsi rufo-testaceous; the elytra clothed with a few scattered brownish, curled, decumbent, bristly hairs, the scutellum with white scales, the vestiture of the under surface and legs very fine, sparse, white, and hair-like. Head finely punctate. Prothorax conical, closely punctate, except along the smooth median line. Elytra finely and narrowly punctate-striate, the sutural stria broader and deeper, the interstices flat and with a few scattered minute punctures.

Length $1\frac{3}{4}$, breadth 1 millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Recognizable by the sparse, fine vestiture, the violaceous, finely-striate elytra, and the flat elytral interstices.

PHILINNA, gen. nov.

Head globose; rostrum long, filiform, strongly arcuate throughout, the antennæ inserted far from the base the funiculus 6-jointed, joint 2 nearly as long as 1, the others shorter, the club stout, acuminate-ovate, with its basal joint short, not longer than the second; eyes oval, in great part exposed, rather large, narrowly separated; prothorax short, convex, subconical, bisinuate at the base; scutellum small; elytra broad, rounded-subquadrate, separately rounded at the apex, leaving the vertical pygidium exposed, the humeri prominent, but obtuse; rostral canal deep, confined to the prosternum; anterior coxæ unarmed, narrowly separated, the prosternum with a short truncated ridge behind each of them; mesosternum vertical, slightly swollen on each side between the middle coxæ, the latter widely separated, the meso-metasternal suture sinuate; metathoracic episterna very broad; ventral segments gradually ascending, 3 and 4 short; legs short; femora unarmed, the posterior pair not reaching beyond the apex of the abdomen; tibiæ unguiculate at the inner apical angle in the ♂ only, the intermediate and posterior pairs with a fringe of short setæ at the outer angle; third tarsal joint strongly bilobed; tarsal claws simple; body subovate, strongly setose, and also clothed with piliform and pectinate scales.

Philinna includes a single species of small size from Guatemala, recognizable at a

glance by the large tuft of erect black setæ at each shoulder of the elytra *. It is evidently related to the following genus, *Philides*, though very dissimilar in facies.

1. *Philinna bicristata*, sp. n. (Tab. VIII. figg. 9, 9 *a-c*.)

Ferruginous, variegated with black, the black markings on the elytra condensed into a common α -shaped patch on the basal half of the disc and a streak at the sides towards the apex; the rostrum testaceous, the base of the femora, tibiæ, and joints 1-3 of the tarsi black, the rest of the legs ferruginous; the elytra sparsely, the rest of the upper surface thickly, clothed with rather long, decumbent, piliform, ochreous and white scales—which are coarser, imbricate, and almost entirely ochreous along the apical half of the suture,—intermixed with very long, erect, scattered, black and white setæ, the black setæ clustered into a large dense tuft on each shoulder, the elytra also with a few radiato-pectinate white scales at the sides and apex; the under surface densely set with pectinate white and ochreous scales, those on the metasternum almost wholly silvery-white; the legs with pallid piliform and pectinate scales and scattered setæ. Rostrum very slender, almost smooth, nearly reaching the apex of the metasternum in the ♀, a little shorter in the ♂. Prothorax densely, finely punctate, and also carinate. Elytra deeply punctate-striate, the interstices convex and not wider than the striæ. Pygidium with two visible segments in the ♂, and one only in the ♀. Beneath closely punctate; ventral segment 5 very deeply emarginate in both sexes, shallowly foveate at the apex in the ♀.

Length $2\frac{1}{5}$ – $2\frac{1}{3}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, Zapote, Pacific slope (*Champion*).

Two specimens only of this extraordinary Curculionid have been obtained.

PHILIDES, gen. nov.

Head globose; rostrum long, filiform, arcuate, the scrobes rapidly descending; antennæ inserted at the middle of the rostrum, the funiculus 6-jointed, the club acuminate-ovate, with its basal joint short, not longer than the second; eyes oval, exposed, rather large, well-separated; prothorax convex, bisinuate at the base, rounded at the apex, without ocular lobes; scutellum small, exposed; elytra oblong, separately rounded at the apex, leaving the vertical bisegmented pygidium exposed; rostral canal deep, confined to the presternum; anterior coxæ narrowly separated, unarmed; mesosternum flattened, subvertical; intermediate coxæ moderately distant; metathoracic episterna very broad; ventral segments 1 and 2 rather convex, 3-5 flattened down the middle, 3 and 4 very short, the second suture bisinuate; legs very slender, moderately long; femora unarmed, the posterior pair not extending beyond the apex of the abdomen; tibiæ unarmed at the inner apical angle; third tarsal joint broad and bilobed; tarsal claws with a broad blunt tooth at the base; body oblong-ovate, hairy and also clothed in part with radiato-pectinate scales.

The single species referred to this genus has the general facies of an *Anthonomus* or *Balanobius*. It seems best placed in the Zygopina, near *Philinna*. The exposed vertical pygidium is suggestive of the Ceuthorrhynchina. The unique type is apparently a male, though it has the tibiæ unarmed at the inner apical angle.

1. *Philides anthonomoides*, sp. n. (Tab. VIII. figg. 10, 10 *a, b*.)

Oblong-ovate, moderately convex, shining, black, the antennæ (the club excepted) and the tips of the tarsi ferruginous; above sparsely clothed with long, fine, erect, white hairs, which become coarser and imbricate along the elytral suture, the basal margin of the prothorax, scutellum, under surface, and

* In the British Museum there is a somewhat similar unnamed S.-American form, with two long spines projecting from each side of the elytra, as in the genus *Pteracanthus*.

pygidium densely set with radiato-pectinate, white scales, the intraocular portion of the head with narrow white scales; legs albo-pilose, the tibiae also with long projecting hairs on their outer edge. Eyes separated by a little less than the width of the rostrum. Rostrum slender, slightly longer than the head and prothorax, sparsely punctulate in its basal half. Joints 2-6 of the funiculus short, 2 small, not longer than 3. Prothorax broader than long, rounded at the sides anteriorly, narrowing from behind the middle; densely, finely, shallowly punctate. Elytra very little wider than the prothorax, subparallel in their basal half; coarsely punctate-striate, the interstices feebly convex and sparsely punctulate. Beneath closely punctate, the ventral segments 3 and 4 smoother in the middle, 5 very deeply emarginate at the apex, leaving the lower segment of the pygidium exposed.

Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (σ ?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen, in perfect condition. A remarkable insect clothed with very long and shorter hairs, and radiato-pectinate* and narrow scales. Similarly pectinate scales or hairs are present in *Philinna*, *Læmorchestes*, *Tachygonus*, a few species of *Otidocephalus*, &c.

ADDENDUM †.

The following very distinct new species of *Piazurus* was not seen till it was too late to insert the insect in its proper place in the Zygotina:—

PIAZURUS (p. 9).

12 (A). *Piazurus ehippiatus*, sp. n. (Tab. VIII. fig. 11.)

Oblong-subrhomboidal, black, clothed with minute brown and ochreous scales, the ochreous scales condensed into a narrow line around the eyes, a narrow, oblique, sharply-defined vitta on each side of the disc of the prothorax, and a line around the submedian band on the elytra, the elytra with the following velvety-black markings—a transverse, rounded patch on each side of the scutellum, a very broad, common, saddle-shaped fascia a little beyond the middle, a spot at the sides in front of this (scarcely visible from above), and an oval spot on the outer part of the disc near the apex; the vestiture of the under surface very scattered, white, ochreous and brown intermixed. Head finely punctate; rostrum carinate and punctate at the base; eyes narrowly separated; joint 2 of the funiculus much longer than 3. Prothorax broader than long, conical; densely, minutely punctate, and finely carinate. Elytra one-half broader than the prothorax, elongate-triangular, rounded at the tip; coarsely seriate-punctate, the interstices flat and minutely punctate. Beneath very sparsely, finely punctate; ventral segment 1 broadly depressed down the middle, 5 truncate at the apex. Pygidium narrowly exposed. Femora unidentate.

Length $13\frac{1}{5}$, breadth $6\frac{1}{2}$ millim. (σ .)

Hab. PANAMA, Chiriqui (*coll. Fry, in Mus. Brit.*).

One specimen, probably collected by Trötsch. Near *P. melanostictus*, Boh., but with several very large velvety-black patches on the elytra.

* Casey (Ann. N. York Acad. Sci. ix. p. 681) uses the term "multifurcate hairs" for this form of vestiture.

† Mr. Fall's paper on the N.-American Zygotina [Trans. Am. Ent. Soc. xxxii. pp. 53-61 (1906)] was received too late to be quoted in the preceding pages.

Group TACHYGONINA.

This group has hitherto included two genera only—*Tachygonus*, Schönh., of the New World, and *Dinorhopala*, Pasc., from Burma &c. *Tachygonus* is here divided into two, and a third unnamed S.-American genus (with the posterior femora strongly and abruptly clavate at the apex) is represented in the British Museum.

TACHYGONUS.

Tachygonus, Schönerr, Gen. Curc. i. p. 311 (1833); Lacordaire, Gen. Col. vii. p. 168; Kirsch, Berl. ent. Zeitschr. 1875, p. 252; Leconte, Proc. Am. Phil. Soc. xv. p. 265; Casey, Ann. N. York Acad. Sci. ix. pp. 679–681.

Tachyopus, Sturm, Cat. p. 352 (1843).

Fourteen species of this genus have been described—six from S. America, one from Mexico, and seven from the United States, and many other unnamed Tropical-American forms are to be found in collections. *Tachygonus* is here restricted to the species with a 7-jointed funiculus* and an ovate antennal club (Tab. VIII. fig. 19 c). Fourteen are now recorded from within our limits, seven of which are represented by single specimens. The powerful hind legs of these insects, as noted long ago by Zimmermann, are used for grasping leaves, and not for saltatorial purposes.

a. Posterior tibiae arcuate; elytra subcordate.

a¹. Prothorax without dense tufts of erect blackish hairs.

a². Elytra with a white scutellar spot.

a³. Posterior tibiae very broadly dilated; posterior femora 4-dentate. *laticrus*, sp. n.

b³. Posterior tibiae narrower, not wider than the femora.

a⁴. Setae of the upper surface coarse; posterior femora 5-dentate. *quinquedentatus*, sp. n.

b⁴. Setae of the upper surface fine; posterior femora 4-dentate. *curvicrus*, sp. n.

b⁵. Elytra each with a narrow transverse arcuate band of pectinate scales, extending down the middle of the disc; posterior femora with several long and short teeth *semirufus*, sp. n.

b⁶. Prothorax with two dense tufts of erect blackish hairs, in addition to the usual setae.

c³. Elytra simply setose, the pectinate scales few in number, the dorsal striae finely punctate and separated by flat interstices; anterior and intermediate femora black; posterior femora 4-dentate . . . *nigrocristatus*, sp. n.

d². Elytra setose, and each with a whitish tuft near the suture below the base and numerous pectinate scales, the striae very coarsely punctate throughout.

* Casey (*op. cit.* p. 681) states that the funiculus is 7-jointed in the N.-American forms: *T. lecontei* is figured by Sturm with a 6-jointed funiculus and by Imhoff with 5 joints only.

- c*³. Alternate elytral interstices raised; anterior and intermediate femora black at the base; posterior femora 4-dentate . . . *fasciculosus*, Boh.
- d*³. Alternate elytral interstices not raised; anterior and intermediate femora almost wholly reddish; posterior femora 6-dentate . . . *bifasciculatus*, sp. n.
- b*. Posterior tibiae sinuate; prothorax without tufts.
- c*¹. Elytra rounded-subquadrate, with a yellowish post-scutellar patch and a broad transverse fascia of scattered pectinate white scales; posterior femora comparatively short, unidentate . . . *pectinisquamis*, sp. n.
- d*¹. Elytra subcordate.
- e*². Elytra with two dense white post-scutellar tufts and scattered pectinate scales; posterior femora bidentate, black to the apex . . . *rhombus*, Casey.
- f*². Elytra with, at most, two small white post-scutellar tufts and numerous pectinate scales; posterior femora bidentate, ferruginous at the apex . . . *caseyi*, sp. n.
- g*². Elytra with a small white scutellar spot, the pectinate scales wanting on the rest of their surface; posterior femora with one long tooth. . . *sinuaticrus*, sp. n.
- h*². Elytra without scutellar spot, the pectinate scales wanting.
- e*³. Elytra black; posterior femora bidentate.
- c*⁴. Posterior tibial claw strongly developed; femoral teeth subcontiguous; setae of the upper surface coarse . . . *flohri*, sp. n.
- d*⁴. Posterior tibial claw feebly developed; femoral teeth distant; setae of the upper surface fine . . . *bidentatus*, sp. n.
- f*³. Elytra piceous or ferruginous, clothed with fine yellowish setae; posterior femora with one or two teeth . . . *flavisetis*, sp. n.

1. *Tachygonus laticrus*, sp. n. (Tab. VIII. figg. 12, 12 a.)

Rhomboidal, moderately broad, shining, black, the tip of the rostrum ferruginous, the antennae, the anterior and intermediate legs, and the apical joint of the posterior tarsi, testaceous; sparsely clothed with very fine, erect, blackish setae, the sides of the prothorax and of the meso- and metasternum, and a scutellar patch on the elytra, thickly set with pectinate white scales; the posterior femora and tibiae thickly nigro-setose, the vestiture of the rest of the legs white. Prothorax closely, coarsely punctate, except along the narrow smooth median space. Elytra broad, transversely cordate; seriato-foveolate, the interstices narrow, somewhat raised, and asperate. Posterior femora very elongate, armed with four long teeth—2 the longest, 3 and 4 placed on the upper and lower edges respectively. Posterior tibiae very broadly arcuato-dilatate, emarginate at the apex externally.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim.

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. Recognizable from the other black forms with coarse elytral sculpture by the very broadly arcuato-dilatate posterior tibiae. The white scutellar spot is a little smaller than in the Mexican *T. quinquedentatus*.

2. *Tachygonus quinquedentatus*, sp. n. (Tab. VIII. figg. 13, 13 a.)

Rhomboidal, broad, shining, black, the rostrum ferruginous at the tip, the antennae and the anterior and intermediate legs testaceous; somewhat thickly clothed with long, rather coarse, erect, blackish setae,

with a few white setæ intermixed, the sides of the prothorax, and of the meso- and metasternum, and a rounded scutellar patch on the elytra, thickly set with pectinate whitish scales, the suture with an imbricate row of rather coarse, decumbent, whitish setæ; the posterior legs strongly setose, the setæ on the tibiæ and outer half of the femora black, the others white, the vestiture of the anterior and intermediate legs also white. Prothorax rather sparsely punctate, except along the broad smooth median space. Elytra broad, transversely cordate; seriato-foveolate, the interstices very narrow, somewhat raised, and asperate, the setæ each arising from a small conical prominence. Posterior femora very elongate, armed with three long and two shorter teeth—2 the longest, 3 and 4 a little shorter, placed one on the lower and one on the upper edge, 1 slightly longer than 5, the latter short. Posterior tibiæ rather broad, arcuate.

Length $2\frac{1}{2}$, breadth $2\frac{1}{8}$ millim.

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*).

One specimen, in perfect condition. Distinguishable by the abundant black setosity, the large white scutellar spot, the imbricate row of white setæ along the elytral suture, and the 5-dentate posterior femora. The seriate punctures of the elytra are large and foveiform, as in several of the allied forms.

3. *Tachygonus curvicrus*, sp. n. (Tab. VIII. fig. 14, hind leg.)

Rhomboidal, shining, black, the rostrum ferruginous, the antennæ, anterior and intermediate legs, and apical joint of posterior tarsi, testaceous; sparsely clothed with very fine, erect, fuscous setæ, the pygidium with white hairs, the flanks of the prothorax and of the meso- and metasternum, and a rather large scutellar patch on the elytra, thickly set with pectinate whitish scales; the posterior femora and tibiæ fusco-setose, the vestiture of the rest of the legs white. Prothorax thickly punctate, except along the narrow smooth median space. Elytra very broad, transversely cordate, rapidly narrowed from a little before the middle; seriato-foveolate, the interstices very narrow and somewhat raised. Posterior femora very elongate, armed with four teeth—1 long and slender (broken off on left femur), 2 very long and curved, 3 and 4 shorter than 1, placed on the upper and lower edges respectively. Posterior tibiæ rather broad, arcuate.

Length $2\frac{1}{10}$, breadth $1\frac{3}{4}$ millim.

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One rather worn specimen, damaged by the pin. Smaller than *T. quinquedentatus*, the prothorax more closely punctate, the setosity finer and sparser, the imbricate whitish setæ along the suture wanting, the posterior femora with the third and fourth teeth placed close to the second and the outer (fifth) tooth absent.

4. *Tachygonus semirufus*, sp. n. (Tab. VIII. figg. 15, 15 a.)

Rhomboidal, shining, ferruginous, the head, a patch on the disc of the prothorax, a curved transverse fascia below the base of each elytron (and in one specimen an oblong patch below it near the suture), the under surface, the femoral spines, and the posterior tibiæ and tarsi in part, piceous or black; somewhat thickly clothed with long, fine, erect, pallid setæ intermixed with a few decumbent white hairs, these latter condensed into an imbricate series along the suture; the sides of the prothorax and of the meso- and metasternum, the shoulders, a narrow curved fascia on each elytron below the transverse black patch, extending down the middle of the disc, and various other small scattered patches towards the sides and apex, set with pectinate white scales; the setæ on the hind legs in great part white. Prothorax somewhat closely punctate, the smooth median line just traceable. Elytra broad, transversely cordate, widening below the shoulders and then rapidly and obliquely narrowed to the truncated apex; coarsely

and closely punctate-striate, the interstices very narrow, the alternate ones somewhat raised. Posterior femora very elongate, armed with numerous scattered minute and three or four longer teeth, the third from the apex much longer than the rest. Posterior tibiae arcuate.

Length $1\frac{9}{10}$ –2, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, David, Bugaba (*Champion*).

Two specimens. In this insect the pectinate white scales are clustered into a narrow arcuate band below the black fascia on each elytron, extending down the middle of the disc to near the apex, and the posterior femora are armed with numerous long and short teeth.

5. *Tachygonus nigrocristatus*, sp. n. (Tab. VIII. figg. 16, 16 a, b.)

Broad ovate, very shining, black, the apex of the rostrum and the apical margin of the elytra ferruginous, the antennae, the anterior and intermediate tarsi, and the posterior pair at the tip, and the anterior tibiae entirely and the intermediate pair at the base, testaceous; clothed with a few scattered long, erect, blackish and white setae, the blackish setae on the prothorax wholly clustered into two fascicles on the basal portion of the disc, the sides of the head and prothorax and of the meso- and metasternum thickly, and the sutural region of the elytra very sparsely, set with pectinate white scales; the vestiture of the anterior and intermediate legs fine and white, the hind legs thickly set with long bristles, which are almost wholly blackish on the femora and tibiae. Prothorax closely, finely punctate, except along the broad, smooth, median space. Elytra very broad, rounded and excavate at the sides, blunt at the tip, depressed on the disc below the base, the humeri and subapical callosities prominent; punctate-striate, the punctures very coarse at the sides and fine on the disc, the interstices almost smooth, broad and flat towards the suture, 9 distinctly costate. Posterior femora moderately elongate, armed with one long* and three short teeth—2 curved and twice the length of the rest, 3 and 4 placed on the upper and lower edges respectively. Posterior tibiae rather broad, arcuate externally.

Length 3, breadth $2\frac{1}{10}$ millim.

Hab. GUATEMALA, Quiché Mountains between 7000 and 9000 feet (*Champion*).

One example. A rather large, broad, comparatively smooth form, with two tufts of blackish setae on the prothorax, strongly nigro-setose hind legs, and quadridentate posterior femora.

6. *Tachygonus fasciculosus*. (Tab. VIII. fig. 17, hind leg.)

Tachygonus fasciculosus, Boh. in Schönh. Gen. Curc. v. p. 456¹.

Hab. MEXICO, between Oaxaca and Acapulco¹.

This species, the unique type of which has been communicated by Dr. Aurivillius, is the largest of the Central-American *Tachygoni* (length 3, breadth $2\frac{1}{2}$ millim.). It may be known by the very coarsely punctate-striate elytra, with raised alternate interstices, long, abundant setosity, and scattered pectinate scales, which are condensed into a tuft on each side of the suture below the base, the bifasciculate prothorax, the strongly quadridentate posterior femora, and the arcuate posterior tibiae.

* Broken off on the right femur.

7. *Tachygonus bifasciculatus*, sp. n. (Tab. VIII. figg. 18, 18 a, b, ♀.)

♀? Rhomboidal, shining, black, the rostrum, antennæ, anterior and intermediate legs, tip of the hind tarsi, apical margin of the elytra, and suture (faintly), testaceous or ferruginous; somewhat thickly clothed with very long, erect, fuscous and pallid setæ, the fuscous setæ on the prothorax clustered into two dense fascicles near the base; the sides of the head and prothorax, and of the meso- and metasternum, two broad, coalescent, transverse fasciæ on the elytra, extending along the suture to the base and apex, and the ventral segments in part, set with ochreous and whitish pectinate scales, the whitish scales clustered into a tuft on the second elytral interstice below the base and another on the fifth beyond the middle; the legs with white and fuscous setæ and pectinato white scales. Rostrum bare, smooth along the middle. Prothorax closely, finely punctate, except along the broad, smooth, basally dilated median space. Elytra very broad, transversely cordate; coarsely and closely punctate-striate, the interstices narrow and rather convex. Posterior femora very elongate, armed with three pairs of spines, the first pair very long. Posterior tibiæ broad, strongly arcuate, subangulate externally at about one-third from the base.

♂? The head, the sides of the prothorax broadly, the suture, apical margin, humeri, and a common transverse fascia before the middle of the elytra, the posterior femora at the apex and towards the base, and the base of the posterior tibiæ, ferruginous. The rostrum with the basal half albo-squamose.

Length $2\frac{1}{10}$ – $2\frac{2}{5}$, breadth $1\frac{3}{8}$ –2 millim.

Hab. GUATEMALA, Capetillo (*Champion*).

Two specimens, apparently belonging to the same species, and differing only in colour, the male somewhat abraded. The two dense fascicles of erect blackish setæ on the prothorax, the closely punctate-striate elytra, set with many pectinate scales (which are clustered into two tufts on each elytron), and the peculiar armature of the hind femora, readily distinguish *T. bifasciculatus*.

Its nearest allies are the N.-American *T. lecontei*, Gyll., and *T. spinipes*, Casey, and the Mexican *T. fasciculosus*, Boh.

8. *Tachygonus pectinisquamis*, sp. n. (Tab. VIII. figg. 19, 19 a–c.)

Short ovate, shining, black, the antennæ and the tips of the tarsi testaceous; somewhat thickly clothed with long, fine, erect, blackish setæ, with white setæ intermixed, those along the apical portion of the suture imbricate; the prothorax with a spot near each hind angle and the flanks, the elytra with a broad space across the middle sparsely, and the sides of the meso- and metasternum more densely, set with pectinate white scales (fig. 19 a), the elytra also with a narrow dense patch of pale ochreous pectinate scales on the suture below the base; the anterior and intermediate legs albo-pilose and fusco-setose, the posterior legs densely fusco-setose, the basal half of their femora with white setæ and pectinate white scales. Prothorax sparsely, finely punctate, except along the smooth median space. Elytra rounded-subquadrate, about as broad as long, gradually, arcuately narrowing from the middle; with rows of closely-placed subquadrate punctures separated by narrow, smooth, rather convex interstices. Legs comparatively stout; posterior femora extending a little beyond the apex of the abdomen, armed with a single prominent slender tooth; posterior tibiæ sinuate; posterior tarsi broad.

Length $2\frac{1}{10}$, breadth $1\frac{1}{2}$ millim.

Hab. MEXICO, Jalapa (*Höge*).

One specimen. This species may be readily identified by the rounded-subquadrate elytra, with scattered pectinate white scales extending across the median third and a large ochraceous post-scutellar patch, the comparatively short, very hairy hind legs, the posterior femora armed with a single tooth, the posterior tibiæ sinuate.

9. **Tachygonus rhombus.** (Tab. VIII. fig. 20.)

Tachygonus rhombus, Casey, Ann. N. York Acad. Sci. ix. pp. 678, 681 (1897) ¹.

Hab. NORTH AMERICA, Arizona ¹.—MEXICO, Northern Sonora (*Morrison*).

Sent us in numbers by Morrison as from Sonora. A small strongly setose form, set with numerous ochreous and white pectinate scales, the white scales clustered into a dense transverse patch on the suture of the elytra below the base and a spot at each hind angle of the prothorax, the vestiture of the under surface dense and white; the posterior femora ferruginous to beyond the middle and armed with one or two sharp teeth; the posterior tibiae sinuate.

10. **Tachygonus caseyi**, sp. n. (Tab. VIII. figg. 21, 21 *a*, *b*.)

Rhomboidal, shining, black, the antennae and legs (the swollen portion of the posterior femora and the apical half of the posterior tibiae excepted) rufo-testaceous; somewhat thickly clothed with long, erect, blackish and white setae, the upper surface also abundantly set with ochreous and white (or entirely white) pectinate scales (fig. 21 *a*), which on the prothorax are condensed into a small spot near each hind angle, the elytra sometimes with a small white tuft near the suture; the under surface densely clothed with pectinate white scales, the posterior legs with numerous long, blackish and white setae, the other legs albo-pilose, with a few dark setae at the knees. Prothorax very finely punctate, with indications of a smooth median line. Elytra broad, transversely cordate; closely punctate-striate, the interstices narrow and asperate. Posterior femora moderately elongate, subclavate, armed with one or two sharp spines. Posterior tibiae strongly sinuate.

Length $1\frac{3}{5}$ –2, breadth $1\frac{2}{5}$ – $1\frac{3}{4}$ millim.

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Zapote, San Gerónimo, Tamahu (*Champion*).

Five specimens. Very near *T. rhombus*, but with the white post-scutellar tufts small or obsolete, the posterior knees rufo-testaceous, like the basal portion of the femur. The hind legs are similarly formed in the two species.

11. **Tachygonus sinuaticrus**, sp. n. (Tab. VIII. figg. 22, 22 *a*.)

Rhomboidal, shining, black, the rostrum ferruginous, the antennae, anterior and intermediate legs, and joints 3 and 4 of the posterior tarsi, testaceous; somewhat thickly clothed with long, erect, black setae, the pygidium with white hairs, the flanks of the prothorax and of the meso- and metasternum sparsely, and a small scutellar patch on the elytra (formed by two oblique tufts) densely, set with pectinate white scales; the posterior femora and tibiae strongly nigre-setose, the vestiture of the rest of the legs white, the anterior and intermediate knees each with two dark setae. Prothorax very sparsely, rather coarsely punctate, except along the smooth narrow median space. Elytra broad, transversely cordate; seriato-foveolate, the interstices very narrow, somewhat raised, and asperate. Posterior femora moderately elongate, armed with one long and several short teeth. Posterior tibiae broad, sinuate.

Length $2\frac{1}{8}$, breadth $1\frac{1}{5}$ millim.

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*).

One specimen. Very like *T. laticrus*, but with the prothorax more finely and sparsely punctate, the posterior femora less elongate and armed with one long spine only, the posterior tibiae sinuous and much less dilated, and the scutellar patch smaller, formed by two small oblique dense tufts of white scales.

12. **Tachygonus flohri**, sp. n. (Tab. VIII. figg. 23, 23 a.)

Tachygonus flohri, Sharp, in litt.

Rhomboidal, shining, black, the antennæ, the anterior and intermediate legs, the posterior femora in part (the extreme base and a space beyond the middle are black), the base of the posterior tibiæ, and the last two joints of the posterior tarsi, ferruginous; somewhat thickly clothed with long, erect, stiff, blackish setæ intermixed with a few whitish hairs, the flanks of the prothorax and of the meso- and metasternum, and the scutellum, set with pectinate white scales; the posterior legs, and the anterior and intermediate knees, strongly nigro-setose, the setæ of the hind femora becoming whitish towards the base. Rostrum almost smooth, punctured along the sides. Prothorax thickly punctate, except along the smooth narrow median space. Elytra broad, transversely cordate; seriato-foveolate, the interstices narrow, asperate, and somewhat raised. Posterior femora moderately elongate, armed with two subcontiguous teeth—the inner one long, the outer one shorter and sometimes inconspicuous. Posterior tibiæ sinuate, the claw at the outer apical angle large.

Length $1\frac{4}{5}$, breadth $1\frac{2}{5}$ millim.

Hab. MEXICO, Juquila in Oaxaca (*Flohri*).

Four specimens. A small strongly setose form, with seriato-foveolate elytra, bidentate, nigro-annulate posterior femora, and greatly developed claw at the outer apical angle of the posterior tibiæ.

13. **Tachygonus bidentatus**, sp. n. (Tab. VIII. fig. 24, hind leg.)

Rhomboidal, shining, black, the antennæ, tip of the rostrum, anterior and intermediate legs, basal half of hind femora, and apical joint of hind tarsi, ferruginous; somewhat thickly clothed with long, fine, erect, fuscous setæ, the flanks of the prothorax and of the meso- and metasternum with pectinate white scales; the posterior femora and tibiæ and anterior and intermediate knees fusco-setose. Prothorax rather coarsely punctate, except along the narrow smooth median space. Elytra broad, transversely cordate; seriato-foveolate, the interstices narrow and somewhat raised. Posterior femora moderately elongate, armed with two slender, distantly-placed teeth. Posterior tibiæ feebly sinuate, the claw at the outer apical angle small.

Length $1\frac{1}{2}$, breadth $1\frac{1}{8}$ millim.

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*).

One specimen. Near the Mexican *T. flohri*, but with the setæ much finer and shorter, the hind femora and tibiæ not so stout and blacker (the basal half of the femur alone rufous), the femora with two slender distantly-placed teeth, the tibial claw small. There is no scutellar spot in either of these insects.

14. **Tachygonus flavisetis**, sp. n. (Tab. VIII. figg. 25, 25 a.)

Rhomboidal, shining, black, the elytra piecous or ferruginous, the rostrum, antennæ, and legs (a small patch on the posterior femora, including the larger spine, and the outer half of the posterior tibiæ, excepted), rufo-testaceous; somewhat thickly clothed with long, fine, erect, ochreous setæ, the flanks of the prothorax and of the meso- and metasternum set with pectinate white scales; the posterior femora and tibiæ with ochreous and blackish setæ. Prothorax sparsely punctate, except along the smooth, narrow, median space. Elytra transversely cordate; seriato-foveolate, the interstices very narrow, smooth, and somewhat convex. Posterior femora moderately elongate, subclavate, armed with one long black spine, and sometimes with a pallid spine adjacent to it. Posterior tibiæ sinuate.

Length $1\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{1}{5}$ millim.

Hab. PANAMA, David, San Lorenzo (*Champion*).

BIOL. CENTR.-AMER., Colcopt., Vol. IV. Pt. 5, February 1907.

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Two specimens. Near the Guatemalan *T. bidentatus*, but with the elytra piceous or ferruginous and more rapidly narrowed posteriorly, the posterior legs in great part ferruginous, their femora armed with one or two teeth.

TACHYGONIDIUS, gen. nov.

Antennæ with a 6-jointed funiculus and a very stout oblong-ovate club; posterior tibiæ elongate-triangular; posterior tarsi enveloped in a dense brush of long hairs.

Type, *Tachygonus phalangium*, Chev.

Two closely allied species are referred to this genus, which is readily distinguishable from *Tachygonus* by the characters given. Both insects are of comparatively large size. The type of *T. phalangium* has been communicated by Dr. Aurivillius for comparison, and we give a figure of its posterior femur and antenna (Tab. VIII. figg. 26, 26 a).

1. *Tachygonidius dasypus*, sp. n. (Tab. VIII. figg. 27, 27 a.)

Subrhomboidal, broad, shining, black, the antennæ, and the anterior and intermediate legs in part, ferruginous, the hind legs piccous, with the femoral spines rufous and the tibiæ castaneous; sparsely clothed with long, erect, black setæ and fulvous and white hairs and pectinate scales, the scales more closely placed on each side of the base of the prothorax, at the base and apex of the elytra, and along the apical two-thirds of the suture; the under surface clothed in part with fulvous and white pectinate scales; anterior and intermediate legs setose and squamose; posterior legs densely clothed with long hairs and scattered setæ, the hairs on the outer face of the femora mostly ochreous and those on the inner edge of the tibiæ black, the tarsal joints almost hidden in a dense brush of very long pale ochreous hairs. Head closely punctate; rostrum very stout, thickly punctate, except along the triangular, shining, median space. Prothorax coarsely, irregularly punctate, except along the smooth narrow median space. Elytra very broad, rounded-triangular, transversely depressed on the disc at the base, each with a large tuberculiform prominence near the suture towards the apex and a smaller prominence on the outer margin a little anterior to it, the humeri also swollen; coarsely, irregularly seriato-foveolate, the foveæ here and there transversely confluent, the alternate interstices somewhat raised anteriorly, 9 subcostate. Posterior femora very elongate, with three long, equidistant teeth, and a small tooth exterior to them. Posterior tibiæ broad, triangular, densely ciliate within. Third tarsal joint broadly bilobed.

Length 5, breadth $3\frac{9}{10}$ millim.

Hab. PANAMA, Tolé (*Champion*).

One specimen. A near ally of *T. phalangium*, Chev., from Cayenne, with three long, equidistant teeth on the posterior femora, the femora themselves densely clothed with ochreous hairs externally, the posterior tibiæ more dilated, and the posterior tarsi enveloped with a denser brush of ochreous hairs.

Group CEUTHORRHYNCHINA.

The North-American members of this group have been exhaustively monographed by Dietz [Trans. Am. Ent. Soc. xxiii. pp. 387-480, tabb. 12-14 (Sept.-Dec. 1896)], and his arrangement is here followed. The Central- and South-American forms mostly belong to the section "Cœliodes." The "Ceuthorrhynchi" and "Phytobii" are

each represented by a few species, which are closely related to, or identical with, north temperate forms.

Hypocæliodes is the most characteristic genus of the group in Tropical America, though very few species have hitherto been described.

Sect. CÆLIODES.

Cæliodes, Dietz.

HYPOCÆLIODES.

Hypocæliodes, Faust, Stett. ent. Zeit. 1896, nos. 1-6, p. 100.

Orchestomerus, Dietz, Trans. Am. Ent. Soc. xxiii. pp. 390, 412 (Sept. 1906).

A comparison of Faust's typical species, *H. coronatus*, from Venezuela, with that of one of the N.-American *Orchestomeri*, *O. wickhami*, Dietz, shows that they are congeneric *, Faust's name having a few months' priority. The species are numerous in Central and South America, and are chiefly recognizable by the deeply sulcate, unarmed or obsoletely dentate femora, the incrassate posterior femora, the short second ventral segment, which is acutely prolonged on each side behind, the excavate meso- and metasternum, the 7-jointed funiculus, and the strongly toothed tarsal claws. The tibiæ, as in *Auleutes*, are sometimes subangulate on the outer edge near the base. Fresh specimens are often more or less coated with a waxy fulvous secretion, as in *Lixus*. The thickened posterior femora are perhaps used for saltatorial purposes †.

- a. Intermediate tibiæ rounded at the base externally; lateral tubercles of the prothorax prominent; metasternum excavate to the middle or apex (feebly so in *O. pollinosus* and *O. dietzi*).
- a'. Elytra uneven, with rows of coarse, deep, oblong punctures; prothorax strongly binodose on the disc, anterior and intermediate femora obsoletely dentate *inaequalis*, sp. n.
- b'. Elytra with or without shallow depressions, punctate-striate, the alternate interstices more or less convex.
- a². Prothorax feebly binodose on the disc; intermediate femora sometimes obsoletely dentate.
- a³. Anterior and intermediate tibiæ unguiculate in ♂ *granulatus*, sp. n.
- b³. All the tibiæ unguiculate in ♂ *unguiculatus*, sp. n.
- b². Prothorax sharply, obliquely bicarinate on the disc; elytra finely punctate-striate; femora unarmed.
- c'. Sutural region of the elytra without brownish scales; lateral tubercles of the prothorax moderately prominent; tibiæ and tarsi stouter: size larger. *bicarinatus*, sp. n.

* The S.-African genus *Elgrius*, Pasc., is very closely related to these insects.

† The European *Rhinoncus perpendicularis*, Reich., can jump a considerable distance, though the hind femora are not much thickened.

- d*¹. Sutural region of the elytra with brownish scales; lateral tubercles of the prothorax more prominent; tibiae and tarsi more slender: size very small *gibbicollis*, sp. n.
- c*². Prothorax bituberculate on the disc, the dorsal and lateral tubercles equal in size.
- c*³. Rostrum longer, stout in ♂, slender in ♀ *pulvereus*, sp. n.
- d*³. Rostrum a little shorter, stout in both sexes *dietzi*, sp. n.
- d*². Prothorax with an interrupted $\vee$ -shaped ridge on the disc *obliquus*, sp. n.
- b*. Intermediate tibiae angularly or subangularly dilated near the base externally; prothorax with two short, sharp, subparallel carinae (or four tubercles) on the disc, the lateral tubercles also prominent; metasternum excavate to about the middle.
- e*¹. Alternate elytral interstices undulato-costate; femora obsoletely dentate: size larger *coronatus*, Faust.
- f*¹. Alternate elytral interstices convex; femora unarmed: size smaller *phytobioides*, sp. n.
- c*. Anterior and intermediate tibiae angularly dilated near the base externally; rostrum (♀) very elongate; elytra coarsely punctate-striate, the alternate interstices much raised; metasternum excavate to the apex *chiriquensis*, sp. n.
- d*. Anterior and intermediate tibiae angularly dilated, and the posterior tibiae slightly widened, near the base externally; rostrum (♀) long; prothorax feebly binodose on the disc, the lateral tubercles small; elytra deeply punctate-striate, the alternate interstices more or less raised; metasternum excavate to the apex *angulatus*, sp. n.

1. *Hypocœliodes inæqualis*, sp. n. (Tab. VIII. figg. 28, 28 a, ♂.)

Short ovate, broad, robust, black, alutaceous; the under surface and legs sparsely clothed with small, cinereous, hair-like scales, the upper surface almost bare. Head densely, rugosely punctate, carinate on the vertex and depressed between the eyes; rostrum very stout, arcuate, as long as the prothorax, rugosely punctate, not carinate. Prothorax rapidly narrowing from the base, abruptly constricted in front; the disc gibbous and canaliculate, the dorsal elevations separated from the prominent lateral tubercles by an oblique sulcus; the anterior margin somewhat produced and notched in the middle; the surface shallowly, confluent punctate. Elytra very broad, rounded at the sides, depressed at the base, below the shoulders, and on the disc beyond the middle; with interrupted rows of coarse, deep, oblong punctures placed in shallow striae, the interstices here and there transversely confluent, alutaceous, and minutely granulate. Metasternum declivous, the excavation reaching to the apex. Ventral segment 5 foveate in the middle in the ♂. Anterior and intermediate femora with a minute tooth. Intermediate tibiae rounded at the base externally, unguiculate at the inner apical angle in the ♂, unarmed in the ♀.

Length 4–4½, breadth 3½–3¾ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Three specimens. This insect has the facies and sculpture of a *Chlamys*, except that the shape is different. The very uneven, seriato-foveolate elytra separate it from all others of the genus.

2. *Hypocœliodes granulatus*, sp. n.

Short ovate, broad, robust, black, alutaceous; the under surface and legs sparsely clothed with narrow cinereous or whitish scales, the upper surface almost bare, but often coated with a fulvous waxy secretion.

Head densely, rugosely punctate, carinate on the vertex, depressed between the eyes, with distinct superciliary ridges; rostrum very stout, arcuate, as long as the prothorax, rugosely punctate and feebly unicarinate. Prothorax rapidly narrowing from near the base, abruptly constricted in front, canaliculate and gibbous on the disc, with sharp lateral tubercles, the anterior margin slightly emarginate in the middle; the surface densely, shallowly, rugosely punctate. Elytra very broad, rounded at the sides, depressed at the base, below the shoulders, and on the disc beyond the middle; punctate-striate, the interstices alutaceous and finely granulate, the alternate ones convex, the others slightly raised. Metasternal excavation deep, reaching to near the apex. Fifth ventral segment foveate in the middle behind, the fovea almost hidden by long coarse white scales. Intermediate femora with indications of a minute tooth. Anterior and intermediate tibiæ unguiculate at the inner apical angle in the ♂, the intermediate pair only with a distinct claw in the ♀.

Length $4\frac{1}{4}$ – $4\frac{1}{2}$, breadth $3\frac{1}{5}$ – $3\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Acapulco (*Höge*), Toxpam (*Sallé*).

Six specimens, all but one from Acapulco. This is one of the largest of the Central-American species, and recognizable by the distinctly granulate, punctate-striate, uneven elytra, and the non-tuberculate disc of the prothorax. The elytra are almost bare when the waxy secretion is removed.

3. *Hypocæliodes unguiculatus*, sp. n.

Short ovate, broad, robust, black, alutaceous; the under surface and legs sparsely clothed with small, narrow, cinereous scales, the vestiture of the upper surface very fine and in part hidden by a mealy secretion. Head densely, rugosely punctate, carinate on the vertex and depressed between the eyes; rostrum stout, arcuate, as long as the prothorax, rugosely punctate. Prothorax canaliculate down the middle, and with prominent lateral tubercles; densely, shallowly punctate. Elytra broad, rounded at the sides, slightly depressed at the base; punctate-striate, the interstices alutaceous and minutely granulate, the alternate ones convex. Metasternal excavation reaching to beyond the middle. Ventral segment 5 foveate in the middle in the ♂, the vestiture not coarser around the fovea. Legs very short; all the tibiæ sharply unguiculate at the inner apical angle in the ♂.

Length 3, breadth $2\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Jalapa (*Höge*).

Two specimens. Smaller than *H. granulatus*, the elytra with shallower depressions, the legs shorter, with all the tibiæ unguiculate in the male, the fovea on the fifth ventral segment unaccompanied by coarser scales, the metasternal excavation shorter.

4. *Hypocæliodes bicarinatus*, sp. n. (Tab. VIII. figg. 29, 29 a, ♀.)

Short ovate, alutaceous, black, the tarsi, antennæ, and apical margin of the elytra ferruginous; sparsely clothed with minute, hair-like, cinereous scales, which are clustered into various faint, irregular, interrupted, nudulate fasciæ on the elytra. Head densely, rugulosely punctate, feebly carinate on the vertex, flattened between the eyes; rostrum stout, arcuate, longer than the prothorax, rugulosely punctate, not carinate. Prothorax rapidly narrowed from the base, feebly constricted in front, the anterior margin notched in the middle; the disc gibbous, canaliculate, and with two sharp oblique carinæ; the lateral tubercles well-developed; the surface finely punctate. Elytra broad, finely punctate-striate, the interstices alutaceous, the alternate ones more or less raised, the others flat. Metasternal excavation reaching to near the apex. Tibiæ unarmed at the inner apical angle*.

Length $2\frac{9}{10}$, breadth 2 millim. (♀.)

Hab. BRITISH HONDURAS, Rio Sarstoon (*Blancaneaux*).

* The spur to the intermediate pair shown by our artist does not exist, though doubtless present in the ♂.

One specimen. Very like the smaller examples of *H. coronatus*, but with the short sharp dorsal carinæ of the prothorax oblique (not parallel), the prothorax itself less constricted in front, the elytra more finely punctate-striate, the femora without trace of tooth, the intermediate tibiæ not subangularly dilated near the base.

5. *Hypocæliodes gibbicollis*, sp. n. (Tab. VIII. figg. 30, 30 a, ♂.)

Short, broad, subrhomboidal, black, the antennæ, anterior margin of the prothorax, apical margin of the elytra, knees, tibiæ, and tarsi rufo-testaceous; variegated above with small cinereous and pale brown scales, the latter mostly crowded into a broad irregular space along the suture, the cinereous scales on the elytra condensed into interrupted undulate fasciæ, the mesothoracic epimera with an ochreous patch. Head rugulose punctate, depressed between the eyes; rostrum arcuate, moderately stout, not longer than the prothorax, rugulose punctate. Prothorax rapidly narrowing forwards, the anterior portion narrow and tubulate; finely punctate, the disc gibbous, canaliculate, and with two short, very prominent, oblique carinæ, the lateral tubercles acute. Elytra broad, rounded-triangular; finely punctate-striate, the interstices rugulose, the alternate ones raised. Metasternal excavation deep, reaching to a little beyond the middle coxæ. Fifth ventral segment of the ♂ excavate at the sides and transversely depressed in the middle, appearing binodose when viewed from behind. Legs short; posterior femora moderately incrassate; tibiæ rather slender, the intermediate pair unguiculate at the inner apical angle in the ♂.

Length $1\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*).

One pair. Smaller than *H. phytobioides*, with still more prominent dorsal elevations on the prothorax and acute lateral tubercles, the brownish scales on the elytra mostly condensed along the suture, the legs more slender. The humeri are more prominent than in *H. wickhami*, and the prothoracic elevations very conspicuous.

6. *Hypocæliodes pulvereus*, sp. n. (Tab. VIII. figg. 31, 31 a, ♂.)

Short ovate, piceous or rufo-piceous, the antennæ ferruginous; mottled with minute whitish and brown scales, which are in part hidden by a fulvous waxy secretion, the vestiture coarser beneath. Head rugulose punctate, finely carinate on the vertex, flattened between the eyes, which are separated by the width of the rostrum; rostrum long, arcuate, reaching the apex of the metasternum, in the ♂ stout, rugulose punctate and sharply carinate to near the tip, with the apex only smooth, in the ♀ much more slender, and shining and almost smooth throughout. Prothorax finely punctate, the lateral tubercles well-developed, the disc with two similar tubercles, separated by the shallow median sulcus. Elytra short, rounded at the sides; rather coarsely punctate-striate, the interstices rugulose, the alternate ones strongly, the others feebly, convex. Meso- and metasternal excavations broad and shallow. Ventral segments 1 and 2 flattened, and 3-5 hollowed, down the middle, and 2 and 5 slightly binodose at the apex, in the ♂. Legs short and stout; posterior femora strongly incrassate, the anterior and intermediate pairs obsoletely dentate; intermediate and posterior tibiæ unguiculate at the inner apical angle in the ♂.

Length $2-2\frac{1}{4}$, breadth $1\frac{1}{2}-1\frac{3}{5}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui, Tolé (*Champion*).

Nine specimens. The almost smooth and comparatively slender rostrum of the female, the sulcate ventral segments 3-5 of the male, and the rather sparse mottled vestiture of the upper surface distinguish *H. pulvereus*.

7. *Hypocæliodes dietzi*, sp. n.

Very like *H. pulvereus*, but differing as follows:—The vestiture of the upper surface denser; the rostrum a little shorter, not reaching the apex of the metasternum, stout in both sexes, rugosely punctate and sharply carinate to the tip in the ♂, with about the apical third smoother and shining in the ♀; the metasternum flattened or slightly hollowed down the centre; the ventral segments 1–4 flattened along the middle, and 5 with a shallow transverse depression, in the ♂.

Length $2\frac{1}{8}$ – $2\frac{1}{3}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, Chacoj in Vera Paz (*Champion*); PANAMA, Bugaba, Caldera, Tolé, San Miguel in the Pearl Is. (*Champion*).

Thirteen specimens. Though so like *H. pulvereus*, this species can be readily separated therefrom by the sexual characters, the female having a much stouter and more rugose rostrum, and the male wanting the longitudinal ventral groove. The prothorax is quadrituberculate, and the intermediate and posterior tibiæ of the male are unguiculate, in the two species.

8. *Hypocæliodes obliquus*, sp. n.

Short ovate, dull, black, the antennæ ferruginous; clothed with scattered, minute, cinereous scales, which are clustered into several small spots on the elytra. Head rugulosely punctate, finely carinate on the vertex, flattened between the eyes; rostrum stout, arcuate, reaching the apex of the metasternum, rugulosely punctate and feebly carinate, becoming much smoother towards the tip. Prothorax narrowing from near the base, feebly constricted in front; densely, finely punctate, the disc with two strongly divergent, feeble, cariniform elevations, separated by a shallow median groove, the lateral tubercles small. Elytra moderately broad, short, rounded at the sides, the humeri not prominent; rather coarsely punctate-striate, the interstices rugulose, the alternate ones raised. Metasternal excavation broad. Legs comparatively stout.

Length 2, breadth $1\frac{1}{3}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Narrower and more ovate than *H. wickhami* (Dietz) (for an example of which we are indebted to Mr. H. F. Wickham), the vestiture very sparse, the dorsal prominences of the prothorax strongly divergent (together forming an interrupted v-shaped ridge), the elytra more coarsely punctate-striate. The dorsal elevations on the prothorax are more oblique than in any of the other Central-American members of the genus.

9. *Hypocæliodes coronatus*. (Tab. VIII. figg. 32, 32 a, b, ♂.)

Hypocæliodes coronatus, Faust, Stett. ent. Zeit. 1896, p. 101¹.

Short ovate, broad, alutaceous, nigro-piceous or black, the antennæ (the club excepted), tarsi, and sometimes the apical margin of the prothorax also, ferruginous; sparsely clothed with cinereous and brownish, minute, hair-like scales, the elytra often with a fuscous streak at the base of the suture, the vestiture of the under surface and legs coarser. Head densely, rugulosely punctate, carinate on the vertex, depressed between the eyes, with distinct superciliary ridges; rostrum very stout, arcuate, as long as the prothorax, rugulosely punctate and tricarinate. Prothorax rapidly narrowing from near the base, abruptly constricted in front; the disc gibbous, canaliculate, and with two short prominent parallel ridges, which are sometimes each divided into two tubercles, the lateral tubercles acute; the anterior margin notched

in the middle and somewhat produced over the head; the surface finely punctate. Elytra very broad, rounded at the sides, depressed at the base, below the shoulders, and on the disc beyond the middle; punctate-striate, the alternate interstices here and there nodose or raised, and also granulate, the others sometimes with a row of minute granules. Metasternum strongly declivous anteriorly, the excavation canaliculate and reaching to a little beyond the middle coxæ. Ventral segments 2 and 5 foveate in the centre in the ♂. Femora with a minute tooth. Intermediate tibiæ subangularly dilated on the outer edge below the base, unguiculate at the inner apical angle in the ♂.

Length $2\frac{2}{3}$ – $3\frac{3}{8}$, breadth 2–3 millim. (♂ ♀.)

Hab. MEXICO, Ventanas in Durango (*Höge*), Toxpam (*Sallé*), Cuernavaca, Teapa (*H. H. Smith*); GUATEMALA, Panzos (*Champion*); PANAMA, Bugaba (*Champion*).—VENEZUELA, Caracas¹.

Nine specimens, varying greatly in size, and in the development of the carinæ on the prothorax (which are often each divided into two tubercles) and the prominences on the elytra.

The type of *H. coronatus*, Faust (kindly communicated by Dr. Heller), has the prothorax and elytral elevations much less prominent than in the Mexican examples; the one from Panama, however, is almost intermediate.

10. *Hypocœliodes phytobioides*, sp. n. (Tab. VIII. figg. 33, 33 a, ♀.)

Short ovate, nigro-piceous or piceous, the antennæ, anterior margin of the prothorax, apical margin of the elytra, knees, tibiæ, and tarsi ferruginous; mottled above with minute brown and whitish scales, the flanks of the prothorax irregularly albo-bilineate, the mesothoracic epimera with an ochreous patch, the vestiture of the under surface sparse and in great part whitish. Head rugulosely punctate, finely carinate on the vertex, depressed between the rather prominent eyes; rostrum not very stout, arcuate, as long as the prothorax, rugulosely punctate, the apical half in the ♀ much smoother and shining. Prothorax rapidly narrowing forwards, the apical portion narrow and tubulate; closely, finely punctate, the disc gibbous, canaliculate, and with two short, prominent carinæ, the lateral tubercles very prominent, compressed, cariniform, parallel. Elytra broad, depressed along the suture at the base, the humeri swollen; finely punctate-striate, the interstices rugulose, the alternate ones raised. Metasternal excavation deep, extending beyond the middle coxæ. Intermediate tibiæ subangularly dilated externally near the base, unguiculate at the inner apical angle in the ♂.

Length $1\frac{3}{4}$ –2, breadth $1\frac{1}{8}$ – $1\frac{3}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*: ♀); GUATEMALA, Aceituno (*Champion*: ♀); NICARAGUA, Managua (*Solari*: ♂ ♀).

Eight specimens, varying in size and colour. Near the N.-American *H. wickhami*, but with larger tubercles on the prothorax and more prominent humeri. The insect has much the facies of a *Phytobius*.

11. *Hypocœliodes chiriquensis*, sp. n. (Tab. IX. figg. 1, 1 a, ♀.)

Short ovate, nigro-piceous, the antennæ, tip of the rostrum, anterior margin of the prothorax, apical margin of the elytra, knees, tibiæ, and tarsi more or less ferruginous; clothed with scattered, minute, hair-like, whitish and fulvous scales, which become more crowded on the sides of the prothorax. Head rugulosely punctate, the eyes rather prominent; rostrum strongly arcuate, moderately stout, reaching the apex of the metasternum, sparsely, very minutely punctate. Prothorax rapidly narrowing from the base, rather coarsely punctate; the disc gibbous, canaliculate, and binodose, the lateral tubercles moderately prominent, the anterior margin notched in the middle. Elytra short and broad, transversely depressed

at the base; coarsely punctate-striate, the interstices rugulose, the alternate ones raised. Metasternal excavation reaching to the apex. Legs short; posterior femora moderately incrassate; anterior and intermediate tibiæ angularly dilated near the base externally.

Length $2\frac{1}{3}$ – $2\frac{1}{2}$, breadth $1\frac{1}{3}$ – $1\frac{1}{6}$ millim. (♀.)

Hab. MEXICO (*Höge, in coll. Solari*); PANAMA, Caldera in Chiriqui (*Champion*).

Two specimens, the one from Chiriqui being taken as the type. The very long, comparatively smooth rostrum, the coarsely punctate-striate elytra, the form of the anterior and intermediate tibiæ, and the quadrinodose prothorax separate *H. chiriquensis* from its immediate allies.

12. *Hypocæliodes angulatus*, sp. n.

Short ovate, moderately shining, piceous, the antennæ and tarsi ferruginous; clothed with scattered, minute, whitish scales, which are seriatly arranged on the elytra and in part hidden by a fulvous mealy secretion. Head rugulose punctate, feebly carinate on the vertex, without trace of superciliary ridges; rostrum arcuate, stout, reaching the apex of the metasternum, shining, sparsely, rather coarsely punctate, rugose at the base, smooth along the middle. Prothorax rapidly narrowing from the base, constricted in front; densely rugulose punctate, canaliculate and feebly binodose on the disc, the dorsal elevations separated from the small lateral tubercles by an oblique groove. Elytra deeply punctate-striate, the interstices somewhat asperate and all more or less raised, the alternate ones more prominent than the others. Metasternal excavation deep. Legs short and rather stout; anterior and intermediate tibiæ angularly dilated, and the posterior tibiæ slightly widened, near the base.

Length $2\frac{1}{3}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. The angularly dilated tibiæ, long stout rostrum, feebly quadrinodose prothorax, and deeply punctate-striate elytra, with raised interstices, sufficiently distinguish *H. angulatus*. The rostrum is stouter and much more distinctly punctate than in the same sex of *H. chiriquensis*, and the alternate elytral interstices are less raised.

AULEUTES.

Auleutes, Dietz, Trans. Am. Ent. Soc. xxiii. pp. 390, 402 (1896).

The various species referred to this genus, which includes ten N.-American forms and the holarctic *A. epilobii* (Payk.), are closely related to *Hypocæliodes* (*Orchestomerus*), but have relatively less thickened posterior femora. The second ventral segment is short and acutely produced on each side posteriorly; the funiculus is 7-jointed*; the rostral canal extends to the meso- or metasternum, and in some species is very deep and closed-in behind; the femora are unarmed and more or less sulcate beneath; the tibiæ are rounded at the base externally; and the claws are toothed. Most of the Mexican and Central-American forms are nearly related to *A. nebulosus* (Lec.): *A. megalops* has very large eyes, but agrees in other respects; *A. inermis* wants both the dorsal and lateral prothoracic tubercles, while in

* Dietz includes two species with a 6-jointed funiculus, but these may have to be removed.

A. cavisternum, *A. mexicanus*, &c. all four tubercles are well-developed; *A. biolleyi* might easily be mistaken for a Phytobiid.

- a.* Metasternum deeply excavate and emarginate (the cavity open behind in *A. cavisternum*), the rostral canal sometimes extending to far beyond the middle coxæ.
 - a*¹. Eyes very large, subcontiguous; prothorax 4-tuberculate; elytral interstices rugulose; pygidium (♂) deeply foveate *megalops*, sp. n.
 - b*¹. Eyes smaller, distant.
 - a*². Elytral interstices with small setigerous tubercles; prothorax bituberculate, without prominences on the disc. *asperipennis*, sp. n.
 - b*². Elytral interstices rugulose.
 - a*³. Prothorax 4-tuberculate.
 - a*⁴. Head sulcate between the eyes: upper surface shining *sulcifrons*, sp. n.
 - b*⁴. Head not sulcate between the eyes: upper surface dull *cavisternum*, sp. n.
 - b*³. Prothorax bituberculate, the disc convex *instabilis*, sp. n.
- b.* Metasternum at most shallowly depressed between the middle coxæ, the rostral canal not extending beyond the mesosternum; elytral interstices rugulose.
 - c*¹. Prothorax 4- or 6-tuberculate.
 - c*². Mesosternum with a prominent ridge on each side between the coxæ; rostrum comparatively slender and almost straight, much smoother in the ♀ than in the ♂ *inspersus*, sp. n.
 - d*². Mesosternum at most feebly carinate on each side between the coxæ.
 - c*³. Rostrum stout, rugose in both sexes; mesosternal depression deeper.
 - c*⁴. Elytra indistinctly cinereo-variegate; intermediate tibiæ of the ♂ sharply unguiculate *mexicanus*, sp. n.
 - d*⁴. Elytra distinctly cinereo-variegate; intermediate and posterior tibiæ of the ♂ sharply unguiculate *similis*, sp. n.
 - d*³. Rostrum comparatively slender, rugose in the ♂ and almost smooth in the ♀; prothorax 6-tuberculate; mesosternal depression almost obsolete *biolleyi*, sp. n.
 - d*¹. Prothorax bituberculate, the disc at most obsoletely binodose *dispersus*, sp. n.
 - e*¹. Prothorax without tubercles; mesosternal depression very shallow *inermis*, sp. n.

1. *Auleutes megalops*, sp. n.

Short ovate, broad, black, variegated above with rufo-piceous, the tip of the rostrum, antennæ, apical margin of the elytra, knees, and tarsi ferruginous; the vestiture very fine and scattered. Head densely, minutely punctate, feebly carinate on the vertex; eyes very large and prominent, almost contiguous in front; rostrum strongly arcuate, stout, very little longer than the prothorax, depressed at the base, rugulose punctate, smoother at the tip. Prothorax subconical, finely punctate, the disc gibbous and strongly binodose, the lateral tubercles prominent, the anterior portion narrow and tubulate, with two small tubercles at the middle of the anterior margin. Elytra very broad, short, compressed at the sides before the middle and transversely depressed at the base, the base itself sharply margined on each side of the scutellum; deeply striate, the striæ finely punctate, the interstices rather convex and densely punctate.

Metasternum arcuato-emarginate, the excavation very deep, closed behind, and extending as far as the posterior margin of the middle coxæ. Fifth ventral segment transversely depressed in the middle. Pygidium deeply foveate. Legs short and rather stout; femora very shallowly sulcate beneath; intermediate tibiæ unguiculate; tarsal claws angularly dilated at the base.

Length $2\frac{1}{2}$, breadth $1\frac{3}{8}$ millim. (♂.)

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*).

One worn specimen, a male. It may be known by the very large eyes (larger than in any Ceuthorrhynchid known to me), the sinuate sides of the elytra, the deeply foveate pygidium, &c.

2. *Auleutes asperipennis*, sp. n.

Short ovate, shining, black, the anterior portion of the prothorax and the elytra reddish or brown, the antennæ, tibiæ, and tarsi more or less ferruginous, the femora usually infuscate; the elytra set with numerous short, stiff, semierect, pallid setæ, and a line of cinereous scales at the base of the suture, the rest of the vestiture very sparse and fine. Head and rostrum rugosely punctate, the latter exceedingly stout, arcuate, and not longer than the prothorax. Prothorax constricted and much narrowed in front; coarsely punctate, the disc without prominences, the lateral tubercles conspicuous. Elytra subcordate, depressed along the suture anteriorly; deeply punctate-striate, the interstices rather convex and set with setigerous granules. Metasternum arcuato-emarginate, the excavation very deep, closed behind, reaching as far as the posterior margin of the middle coxæ. Fifth ventral segment feebly foveate, and the tibiæ unguiculate at the inner apical angle, in the ♂.

Length $1\frac{1}{2}$ – $1\frac{3}{4}$, breadth 1 – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Eleven specimens. The only Central-American Ceuthorrhynchid known to me with minute, pointed, setigerous granules on the elytra. *A. asper* and *A. tenuipes* (Lec.) appear to be allied forms.

3. *Auleutes sulcifrons*, sp. n.

Short ovate, shining, black, the antennæ, apical margin of the elytra, knees, tibiæ, and tarsi ferruginous; clothed with widely scattered, minute, hair-like, white scales, which on the elytra are almost wholly condensed into two common, interrupted fasciæ—one, before the middle, strongly undulate, the other towards the apex, transverse. Head coarsely punctate, sulcate between the eyes; rostrum stout, curved, not longer than the prothorax, very sparsely punctate, smooth along the middle. Prothorax constricted and much narrowed in front, coarsely punctate; the disc shallowly sulcate and with two short oblique ridges, the lateral tubercles acute and very prominent, the anterior margin feebly emarginate in the middle and with two small widely-separated prominences. Elytra rounded-triangular, sinuate at the base, the humeri rather prominent; deeply punctate-striate, the interstices somewhat asperate, the alternate ones convex. Metasternum arcuato-emarginate, the excavation very deep, closed behind, reaching as far as the posterior margin of the middle coxæ.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*).

One specimen. More shining than its allies, the head sulcate between the eyes, the rostrum (♀) comparatively smooth, the prothorax binodose on the disc and with acute lateral tubercles, the elytra faintly and irregularly albo-bifasciate.

4. *Auleutes cavisternum*, sp. n.

Short ovate, dull, black, the anterior margin of the prothorax, and the legs in part, ferruginous; the vestiture very fine, brownish and cinereous (in great part abraded). Head rugulosely punctate; rostrum stout, arcuate, about as long as the prothorax, rugulosely punctate and also carinate. Prothorax constricted and much narrowed in front, densely, rugulosely punctate, the disc nodose and with two short, curved, prominent ridges, the space between them depressed, the lateral tubercles prominent, the anterior margin notched in the centre. Elytra deeply punctate-striate, the interstices rugulose, the alternate ones raised, the others somewhat convex. Meso- and metasternal excavations deep, limited on each side by a conspicuous ridge, the cavity in the metasternum reaching to the middle and open behind. Fifth ventral segment transversely depressed in the middle. Legs short, intermediate tibiae unguiculate at the inner apical angle.

Length $1\frac{5}{8}$, breadth $1\frac{1}{3}$ millim. (σ .)

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*).

One specimen, in bad condition. The short, acute ridges on the disc of the prothorax, the raised alternate elytral interstices, and the long, deep rostral canal distinguish *A. cavisternum*. The elytral suture appears to have a greyish streak at the base. The posterior femora are a little less incrassate, and the humeri more prominent, than in *Hypocæliodes obliquus*, which is otherwise very like *A. cavisternum*.

5. *Auleutes instabilis*, sp. n. (Tab. IX. fig. 2, φ .)

Short ovate, moderately shining, black, the antennæ, apical margin of the elytra, knees, tibiae, and tarsi more or less ferruginous; the vestiture very fine and sparse, brownish and white intermixed, the elytra with scattered coarser white scales, which are usually concentrated into a transverse, narrow, curved, interrupted fascia on the outer part of the disc at about the middle and a few small spots. Head and rostrum rugosely punctate, the latter stout, arcuate, and in some specimens reaching far beyond the middle coxæ. Prothorax constricted and much narrowed in front, coarsely punctate, the disc faintly sulcate and without prominences, the lateral tubercles sharp. Elytra deeply punctate-striate, the interstices convex and finely asperate. Metasternum arcuate-emarginate, the excavation very deep, closed behind, and sometimes extending to the middle. Intermediate tibiae feebly unguiculate at the inner apical angle in the σ .

Length $2-2\frac{1}{2}$, breadth $1\frac{1}{4}-1\frac{3}{4}$ millim. (σ φ .)

Hab. MEXICO (*Truqui*, in coll. *Fry*), Chilpancingo, Teapa (*H. H. Smith*); GUATEMALA, San Isidro (*Champion*); PANAMA, Bugaba (*Champion*).

Eight specimens, varying in the length of the rostrum and rostral canal, and in the disposition of the coarser scattered white scales on the elytra, these being usually condensed into small spots and sometimes into a short streak at the base of the suture. The simply convex, non-tuberculate disc of the prothorax, &c., separates *A. instabilis* from *A. sulcifrons*. The deeply excavate metasternum distinguishes it from the other similar forms.

6. *Auleutes inspersus*, sp. n.

Short ovate, black or piceous, the antennæ, and the legs wholly or in part, ferruginous; the vestiture fine, brown and white intermixed, the white scales on the elytra condensed into irregular, interrupted, undulate fasciæ. Head rugulosely punctate, carinate on the vertex, the eyes rather prominent; rostrum comparatively slender, feebly curved, reaching as far as the posterior margin of the middle coxæ, rugulosely punctate and obsoletely carinate in the σ , much smoother and shining in the φ . Prothorax

constricted and much narrowed in front, finely punctate; the disc binodose and shallowly sulcate, the lateral tubercles moderately prominent, the anterior margin notched in the middle. Elytra deeply punctate-striate, the interstices finely asperate, the alternate ones raised. Mesosternum with a very prominent oblique ridge on each side between the middle coxæ, the metasternum flattened or slightly depressed in front. Fifth ventral segment deeply foveate in the middle, and all the tibiæ unguiculate at the inner apical angle, in the ♂.

Length $1\frac{7}{8}$ – $2\frac{1}{8}$, breadth $1\frac{1}{8}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Höge, in coll. Solari*), Atoyac in Vera Cruz, Teapa (*H. H. Smith*); GUATEMALA, San Gerónimo (*Champion*).

Eight specimens. In this species the rostrum is almost straight, comparatively slender, and very much smoother in the female than in the male, and the apical portion of the rostrum is received between the two prominent mesosternal carinæ, the rostral canal not reaching the metasternum.

7. *Auleutes mexicanus*, sp. n.

Short ovate, dull, black, the antennæ and tarsi, and sometimes the apical margin of the elytra also, ferruginous; the vestiture fine and rather close, fuscous intermixed with cinereous, the cinereous scales clustered into small, scattered, faint patches on the elytra (but not extending on to the suture at the base), the under surface with coarser whitish scales. Head rugosely punctate; rostrum very stout, arcuate, a little longer than the prothorax, rugosely punctate and finely carinate. Prothorax constricted and much narrowed in front, densely, rather coarsely punctate, the apical margin notched in the middle, the disc binodose and shallowly sulcate, the lateral tubercles sharp, the ocular lobes rather prominent. Elytra punctate-striate, the interstices rugulose, the alternate ones convex. Mesosternum somewhat deeply excavate, the metasternum also slightly depressed between the middle coxæ. Fifth ventral segment with a large fovea in the ♂. Legs rather stout, the posterior femora thickened; intermediate tibiæ strongly, and the posterior tibiæ feebly, unguiculate at the inner apical angle in the ♂.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Omilteme, Chilpancingo, and Amula in Guerrero (*H. H. Smith*), Yolos in Oaxaca (*Sallé*).

Six specimens. In this insect the elytra are faintly mottled with cinereous, the prothorax is quadrituberculate, the rostrum is very stout and rugose in both sexes, and the intermediate tibiæ only of the male are sharply unguiculate. The posterior femora are rather stout, and the species would be almost as well placed in *Hypocaliodes*, near *H. phytobioides*.

8. *Auleutes similis*, sp. n.

Very like *A. mexicanus*, but with the cinereous scales more abundant above, clustered on the elytra into various irregular, interrupted, undulate fasciæ and a short streak at the base of the suture; the fifth ventral segment with a shallow transverse impression, and both the intermediate and posterior tibiæ strongly unguiculate, in the ♂.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{2}{3}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Xucumanatlan in Guerrero (*H. H. Smith*).

Three males and one female, apparently specifically distinct from *A. mexicanus*, the male-characters differing in the two forms.

9. *Auleutes biolleyi*, sp. n. (Tab. IX. fig. 3, ♀.)

Short ovate, black, the antennæ, apical margin of the elytra, knees, and tarsi ferruginous; variegated above with a somewhat dense clothing of small cinereous (or pale ochreous) and brown scales, the dorsal elevations of the prothorax and the base of the suture blackish. Head finely, rugulosely punctate, slightly depressed between the eyes; rostrum arcuate, comparatively slender, longer than the prothorax, rugulose and dull in the ♂, a little more elongate, shining, and almost smooth in the ♀. Prothorax narrowing from near the base, densely, finely punctate, the disc sulcate and binodose, the lateral tubercles prominent, the anterior margin notched in the middle and armed with two small compressed tubercles. Elytra broad, finely punctate-striate, the interstices rugulose, the alternate ones rather convex, the sutural region depressed anteriorly. Mesosternal excavation almost obsolete, limited on each side by a distinct ridge. Fifth ventral segment shallowly foveate, and the intermediate tibiæ unguiculate at the inner apical angle, in the ♂.

Length 2, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. COSTA RICA, San José (*Biolley*).

One pair. This species has wholly the facies of a Phytobiid, but as the mesosternal depression is traceable, and the funiculus is 7-jointed, it must be placed in *Auleutes*. The rostrum is almost smooth in the female, and rugose in the male, as in *A. inspersus*.

10. *Auleutes dispersus*, sp. n.

Short ovate, black, the antennæ, anterior margin of the prothorax, apical margin of the elytra, knees, and tarsi ferruginous; the vestiture very fine, cinereous intermixed with brown, the cinereous scales on the elytra not clustered into definite spots, the under surface with scattered whitish scales. Head rugulosely punctate, carinate on the vertex; rostrum very stout, arcuate, rather longer than the prothorax, rugosely punctate. Prothorax densely, finely punctate, the disc shallowly sulcate, not or obsoletely binodose, the lateral tubercles prominent, the anterior margin notched in the middle. Elytra punctate-striate, the interstices rugulose and feebly convex. Mesosternum somewhat deeply excavate, the metasternum also slightly depressed between the middle coxæ. Fifth ventral segment feebly foveate in the ♂. Legs rather slender; intermediate and posterior tibiæ sharply unguiculate at the inner apical angle in the ♂.

Length 2-2 $\frac{1}{2}$, breadth $1\frac{1}{2}$ -1 $\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui, in coll. Fry*), Xucumanatlan and Amula (*H. H. Smith*).

Three specimens. Closely related to *A. mexicanus* and *A. similis*, the prothorax finely punctate and without definite tubercles on the middle of the disc, the vestiture very fine, not clustered into definite markings on the elytra.

11. *Auleutes inermis*, sp. n.

Short ovate, black, the antennæ, the extreme base of the femora, knees, and tarsi (the apical joint excepted) ferruginous; the vestiture very fine, fuscous above, with scattered coarser white scales intermixed, these latter condensed into a narrow longitudinal line on each side of the disc of the prothorax, which extends outwards along the basal margin, and various faint spots and streaks on the elytra (a short streak on the second interstice below the base and a transverse mark at the middle of the sides conspicuous), the under surface also with white scales. Head rugulosely punctate, the eyes separated by rather less than the width of the rostrum; the latter stout, feebly arcuate, a little longer than the prothorax, rugulosely punctate and finely carinate. Prothorax constricted in front, narrowing from near the base; densely, very finely punctate, the anterior margin notched in the centre, the dorsal and lateral tubercles wanting. Elytra subcordate, deeply punctate-striate, the interstices rugulose and somewhat convex. Mesosternal excavation very shallow. Legs comparatively slender; intermediate and posterior tibiæ feebly unguiculate at the inner apical angle.

Length 1 $\frac{2}{3}$, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. NICARAGUA, Chontales (*Janson*).

Very like the N.-American *A. nebulosus* (Lec.), but smaller and duller, the prothorax without tubercles and more finely punctate. The fifth ventral segment is unimpressed. The mesosternal excavation is limited on each side by a faint ridge. One specimen.

Sect. PHYTOBIL.

Phytobii, Dietz.

DIETZELLA, nom. nov.

Cælogaster, Schönherr, Gen. Curc. iv. p. 588 (1837); Lacordaire, Gen. Col. vii. p. 208; Leconte, Proc. Am. Phil. Soc. xv. p. 282 (part.); Dietz, Trans. Am. Ent. Soc. xxiii. p. 455 (nec Schrank, 1780).

Dietz restricts *Cælogaster* to two N.-American species (neither of which I have seen), and *Ceuthorhynchus sextuberculatus*, Boh., evidently ought to be included in the same genus. Its chief characters are, the stout, moderately long rostrum, with deep, parallel scrobes, the 6-jointed funiculus, the prominent supra-orbital ridges, the well-developed ocular lobes of the prothorax, the unarmed femora, and the strongly toothed tarsal claws. The genus belongs to the "*Phytobii spurii*" of Dietz.

1. *Dietzella sextuberculata*. (Tab. IX. figg. 4, 4 a.)

Ceuthorhynchus sextuberculatus, Boh. in Schönh. Gen. Curc. viii. 2, p. 131¹.

Hab. MEXICO¹ (*Truqui*, in coll. *Fry*), Xucumanatlan in Guerrero (*H. H. Smith*).

We have received a single specimen of this species from Guerrero, agreeing with the type communicated by Dr. Aurivillius, and there is also an example of it in the Fry collection in the British Museum; they are probably all of the female sex.

PERIGASTER.

Perigaster, Dietz, Trans. Am. Ent. Soc. xxiii. p. 458 (1896).

The single species placed under this genus has the characters assigned to *Perigaster* by Dietz, except that the tarsal claws are toothed* as in *Dietzella* (*Cælogaster*) and the supra-orbital ridges are wanting. The rostrum is short and stout, with narrow oblique scrobes; the funiculus is 6-jointed; the eyes are rather prominent; the ocular lobes of the prothorax are almost obsolete; the anterior coxæ are well-separated; and the rostral canal does not reach the mesosternum.

* In the N.-American *Pelenomus cavifrons*, Lec. (several specimens of which have been sent me by Mr. Wickham), the tarsal claws have a short acute tooth, a character overlooked by both Leconte and Dietz.

1. *Perigaster tetracanthus*, sp. n. (Tab. IX. figg. 5, 5 a, ♂.)

Broad ovate, short, dull, black or piceous, the elytra rufescent in one specimen, the antennæ, anterior margin of the prothorax, apical margin of the elytra, and legs ferruginous; thickly clothed with small scales; the prothorax with the entire disc, a faint median line (and sometimes a small spot near each lateral tubercle also) excepted, blackish, and the declivous sides whitish or ochreous; the elytra blackish-brown or brown, more or less mottled with cinereous beyond the middle, the pallid scales sometimes predominating over their entire surface; the vestiture of the under surface whitish or ochreous. Head and rostrum rugulose punctate, the vertex carinate, the eyes rather prominent, without supra-orbital ridge, the rostrum short and stout. Prothorax rapidly narrowing from near the base, densely, finely punctate; the disc gibbous and sulcate, the lateral tubercles acute, the anterior margin broadly and shallowly emarginate in the middle, the emargination limited on each side by an acute compressed tubercle. Elytra broad, finely punctate-striate, the interstices feebly convex and densely rugulose, the suture depressed at the base. Prosternal sulcus moderately deep, the anterior coxæ separated by about the width of one of them. Intermediate tibiæ sharply, and the posterior tibiæ feebly, unguiculate at the inner apical angle in the ♂; tarsal claws with a long tooth.

Length 2-2½, breadth 1½-1⅔ millim. (♂ ♀.)

Hab. MEXICO (*Höge*, in coll. *Solari*), Teapa (*H. H. Smith*); GUATEMALA, San Gerónimo (*Champion*); COSTA RICA, San José (*Biolley*).

Seven specimens, varying in the colour of the vestiture, &c., though the prothorax always has a very large triangular blackish space on the disc.

Sect. CEUTHORRHYNCHI.

Ceutorhynchi, Dietz.

CEUTHORRHYNCHUS.

Ceuthorhynchus, Germar, Ins. Sp. Nov. p. 217 (1824); Schönherr, Gen. Curc. iv. p. 475.

Ceutorhynchus, Leconte, Proc. Am. Phil. Soc. xv. p. 272 (part.); Dietz, Trans. Am. Ent. Soc. xxiii. pp. 419, 420 (part.).

A holarctic genus, very numerous in species in the Palæarctic region, and in North America extending southwards to the mountains of Guatemala.

1. *Ceuthorrhynchus rapæ*.

Ceuthorhynchus rapæ, Gyll. in Schönh. Gen. Curc. iv. p. 547¹; Lec. Proc. Am. Phil. Soc. xv. pp. 273, 274².

Ceuthorhynchus affluens, Dietz, Trans. Am. Ent. Soc. xxiii. pp. 420, 421³.

Hab. NORTH AMERICA, Canada^{2 3}, Middle and Western States^{2 3}.—MEXICO (*Truqui*, in coll. *Fry*), Mexico City (*H. H. Smith*).—Europe¹, &c.

There can be little doubt that Leconte correctly identified this species, Dietz's comparative description (*l. c.*) of the European *C. rapæ*, Gyll., being evidently taken from the allied *C. assimilis*, Payk. We are indebted to Mr. Wickham for a N.-American example of *C. affluens* for comparison. The insect has probably been introduced into Mexico with cruciferous plants. One of the four Mexican specimens before me is in very fresh condition.

2. *Ceuthorrhynchus truquii*, sp. n. (Tab. IX. fig. 6, ♂.)

Short ovate, somewhat flattened above, dull, nigro-piceous or piceous, the antennæ, tibiæ and tarsi, and sometimes the femora also, ferruginous; the upper surface thickly clothed with small, narrow, intermixed brown and white scales, the latter condensed into three lines on the prothorax and various small scattered patches on the elytra, the elytra also with a dense, elongate, white scutellar patch; the vestiture of the legs and under surface white. Head rugulosely punctate; rostrum long and slender, arcuate, the basal half thickly, and the apical half sparsely, punctate, smoother in the ♀; antennal club acuminate-ovate. Prothorax short, abruptly narrowed and constricted at about the middle, densely, finely punctate, the disc faintly sulcate, the lateral tubercles well-developed, the anterior margin a little raised on each side of the shallow central emargination, the ocular lobes prominent. Elytra much wider than the prothorax, oblong-subquadrate, finely punctate-striate, the interstices densely rugulose. Femora unarmed. Intermediate and posterior tibiæ unguiculate at the inner apical angle in the ♂. Tarsal claws with a short tooth.

Length $2-2\frac{1}{2}$, breadth $1\frac{1}{8}-1\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Omilteme in Guerrero 8000 feet (*H. H. Smith*); GUATEMALA, Quiche Mts. 7000-9000 feet (*Champion*).

Seven examples. Near *C. adspersulus*, Dietz, but with the close fine vestiture wholly squamiform, the intermixed narrow white scales on the elytra not so large, the prothorax with prominent lateral tubercles. The elytral markings are variable and the legs are sometimes entirely ferruginous.

3. *Ceuthorrhynchus adspersulus*.

Ceuthorrhynchus adspersulus, Dietz, Trans. Am. Ent. Soc. xxiii. pp. 437, 441¹.

Hab. NORTH AMERICA, California and Arizona¹.—MEXICO, Northern Sonora (*Morrison*).

Sent to us in numbers as from Sonora, under the name *C. pusillus*. The elytral vestiture in this insect is piliform intermixed with rather large oval white scales.

CEUTHORRHYNCHIDIUS.

Ceuthorhynchidius, Jacquelin Duval, Gen. Col. Europ. i. Introd. p. ceviii (1857); iv. p. 60 (1868).

Calosirus, Thomson, Skand. Col. i. p. 140 (1859); vii. p. 254 (1865).

Ceutorhynchus, Leconte, Proc. Am. Phil. Soc. xv. p. 272 (part.); Dietz, Trans. Am. Ent. Soc. xxiii. pp. 419, 420 (part.).

This genus has not been adopted by American Coleopterists, nevertheless it seems to me convenient to retain it, the species being easily separable from *Ceuthorrhynchus* by the 6-jointed funiculus. Fourteen N.-American forms possess this character and two are now added from Mexico.

1. *Ceuthorrhynchidius wickhami*, sp. n. (Tab. IX. figg. 7, 7 a, ♀.)

Oblong ovate, flattened above, dull, nigro-piceous, the anterior margin of the prothorax and the legs sometimes ferruginous; the upper surface densely clothed with small, narrow, intermixed brown and whitish scales, the latter condensed into a faint median vitta on the prothorax and various small scattered patches on the elytra, these becoming coalescent at the apex, the elytra also with a dense, oblong, scutellar patch of overlapping white scales; the vestiture of the under surface and legs whitish. Head rugulosely

punctate; rostrum long, arcuate, not very slender, thickly punctate in its basal half, the apical half smoother; antennal club long, acuminate-ovate, the funiculus 6-jointed, 1 and 2 subequal in length. Prothorax broader than long, abruptly narrowed and tubulate in front, densely, finely punctate, the anterior margin raised, feebly emarginate, the lateral tubercles wanting, the base almost straight, the ocular lobes prominent. Elytra much wider than the prothorax, oblong-subquadrate, finely punctate-striate, the interstices densely rugulose, somewhat asperate towards the sides and apex. Femora unarmed. Tarsal claws simple.

Length $3\frac{1}{2}$, breadth $1\frac{2}{3}$ – $1\frac{7}{8}$ millim. (♀.)

Hab. NORTH AMERICA, Parowan, Utah (*Wickham*).—MEXICO (*Truqui, in coll. Fry*), Mexico City (*H. H. Smith*).

Six specimens, the four from Utah (sent to me as an undescribed species by Mr. H. F. Wickham) with the legs almost entirely ferruginous. Following Dietz's arrangement, the present insect belongs to the *C. septentrionis*-group, but it is very much larger than any of the eight forms enumerated by him. *C. wickhami* has somewhat the facies of the much smaller European *C. quercicola*, Payk. It lives on a species of *Argemone* *, belonging to the order Papaveraceæ.

2. *Ceuthorrhynchidius aztecus*, sp. n.

Ovate, narrow, shining, nigro-piceous, the elytra reddish at the apex, the tip of the rostrum and the legs in great part ferruginous; thickly clothed with small, oblong-ovate brownish and larger dirty-white scales, the brownish scales with a brassy lustre, the others condensed into a median line on the prothorax and an elongate scutellar patch on the elytra, the scales at the sides of the latter, like those on the under surface and legs, white. Head rugulosely punctate; rostrum moderately long, arcuate, striato-punctate, smoother at the tip; antennal club acuminate-ovate; funiculus 6-jointed, 3 much shorter than 2, 2 nearly as long as 1. Prothorax short, rounded at the sides, constricted and much narrowed in front, densely, finely punctate, the lateral tubercles small, the anterior margin truncate. Elytra oblong-subquadrate, finely punctate-striate, the interstices rugulose. Femora unarmed. Intermediate and posterior tibiae feebly unguiculate at the inner apical angle. Tarsal claws simple.

Length $1\frac{1}{2}$, breadth $\frac{9}{10}$ millim. (♂.)

Hab. MEXICO, Mexico City (*H. H. Smith*).

One specimen. This minute insect belongs to Dietz's *C. septentrionis*-group, but it cannot be identified with any of the species described by him. The scales on the prothorax have a brassy lustre, and those on the scutellar patch and at the sides of the elytra are rather large and oval.

Group BARINA.

Under this group are included the Ambatides, Péridinétides, Pantotélides, and Baridiides of Lacordaire, all of which have ascending mesothoracic epimera†. The "Ambatides" were widely separated from the Barina in his arrangement, on account of

* *A. mexicana* is a common weed in Mexico and *A. hispida* inhabits both Utah and Northern Mexico (cf. Biol. Centr.-Am., Bot. i. p. 27).

† The S.-American genera *Bebelatus*, *Glycaria*, and *Enops*, Pasc., are Cryptorrhynchids: *Bebelatus* comes near *Xenosomus*, Faust; *Glycaria* and *Enops* belong to *Conotrachelus* in the wide sense, both having toothed tarsal claws and non-ascending mesothoracic epimera.

their contiguous anterior coxæ, a character possessed by various true Barids. The genera *Ambates* and *Pteracanthus* are, in fact, extremely closely related to the "Péridinétides," near which they must obviously be placed. These latter again are so nearly allied to the "Baridiides" that the best course seems to be to place them all under one group, Barina, which in Tropical America must be nearly or quite as numerous in species as the Cryptorrhynchina.

Sect. AMBATIDES.

Ambatides, Lacordaire.

AMBATES.

Embates, Chevrolat, Col. Mex., Cent. i. fasc. i. no. 17 (1833) (sine descr.).

Ambates, Schönherr, Gen. Curc. iii. p. 278 (1836), vii. 2, p. 150 (1843); Lacordaire, Gen. Col. vi. p. 513; Chevrolat, Ann. Soc. Ent. Fr. 1877, p. 341.

Drepanambates, Jekel, Ann. Soc. Ent. Belg. xxvi. p. 85 (1883).

Ambates includes a large number of Tropical-American forms, some of them so like a *Hilipus* or *Cholus* as to be constantly mistaken for species of those genera*. The chief characters of the present genus (apart from the ascending mesothoracic epimera) are, the contiguous anterior coxæ, the flattened or obsoletely sulcate anterior portion of the prosternum, the descending scrobes (which are placed along the lower outer edges of the rostrum), and the strongly dentate femora. The rostrum is stout and arcuate, and the antennæ, except in those species with the rostrum more elongate than usual † (= *Drepanambates*, Jekel), are inserted beyond the middle, at least in the male. The tarsal claws, as noted by Lacordaire, are in some species subconnate at the base, and in others free. The males have the first one or two ventral segments, and sometimes the fifth also, depressed or excavate down the middle; and in a few cases (*A. melanops*, *A. ocellatus*, *A. cretifer*, and *A. polymorphus*) the posterior tibiæ are ciliate within in this sex‡. The species may be grouped thus:

Prothorax feebly convex or subconical; outer dorsal interstices of the elytra not costate.

Prothorax and elytra with large white (or pale ochreous) patches on each side extending downward on to the under surface of the body Species 1.

* *Neodus*, Pascoe, referred by its author to the "Cholina," belongs to the "Ambatides"; it is closely related to *Ambates*.

† *A. leucopleura*, *A. belti*, *A. angustatus*, *A. albiventris*, *A. immaculatus*.

‡ *Ambates decemnotatus*.—Very near *A. cretifer*, Pasc., but with the prothorax more convex, strongly rounded at the sides, densely punctate, and obsoletely carinate; the ochreous patch on each side of the prothorax and the subhumeral patch on the elytra not extending so far downward, the latter triangular and disconnected from the metasternal spot, the other markings as in *A. cretifer*, that on the abdomen wanting, the rest of the elytral surface clothed with minute black scales; ventral segments 1 and 2 broadly excavate down the centre, and all the tibiæ densely ciliate with long blackish hairs from the middle to the apex, in the ♂.—Length $9\frac{3}{4}$, breadth $3\frac{2}{5}$ millim.—*Hab.* COLOMBIA (coll. Fry, in *Mus. Brit.*).

- Prothorax and elytra with a sharply-defined continuous or interrupted white (or pale ochreous) vitta on each side, which sometimes reaches the apex, the elytra (except in *A. belti*) without black markings on the disc . . . Species 2-9.
- Prothorax obsoletely lineate on each side; elytra with a complete or interrupted pale ochreous fascia . . . Species 10, 11.
- Prothorax obsoletely lineate on each side; elytra each with three small pale ochreous spots . . . Species 12.
- Prothorax sharply vittate on each side; elytra each with a broad, sinuous, interrupted ochreous stripe, which on the apical half is limited on each side by a black patch . . . Species 13.
- Prothorax broadly vittate on each side; elytra each with two black marks, the rest of their vestiture close and uniform. . . Species 14.
- Prothorax usually narrowly vittate or lineate on each side; elytra each with one or two black (or dark brown) velvety patches on the disc.
- The dark markings not confluent at the suture, often followed or preceded by a white (or ochreous) spot or streak, or edged with white (or ochreous) scales . . . Species 15-26.
- The single dark patch on each elytron confluent with the opposite one at the suture . . . Species 27.
- The dark markings on the elytra reduced to a common, short, transverse fascia . . . Species 28.
- Prothorax narrowly vittate on each side; elytra each with a minute spot on the fifth interstice and an irregular apical patch ochreous . . . Species 29.
- Prothorax broadly vittate on each side; elytra with an irregular ochreous apical patch, the rest of their vestiture black . . . Species 30.
- Prothorax with the flanks and the elytra each with an apical spot and an oblique patch beneath the shoulder, whitish . . . Species 31.
- Prothorax and elytra immaculate; the vestiture uniform above and beneath . . . Species 32.
- Prothorax transversely convex; outer dorsal interstices of the elytra narrowly costate anteriorly; prothorax and elytra fasciate . . . Species 33.

1. **Ambates cretifer.** (Tab. IX. figg. 8, ♂; 9, ♀, var.)

Ambates cretifer, Pasc. Ann. & Mag. Nat. Hist. (5) vi. p. 177¹.

Ambates octonotatus, Jekel, in litt.².

Hab. NICARAGUA, Chontales¹ (*Belt*); COSTA RICA (*Pittier*, in *Mus. Brit.*; *Van Patten*), San Carlos (*ex coll. Schild-Burgdorf*), Cariblanco, Sarapiquí (*Lankester*), Savanillas de Pirris (*Underwood*).

Var. The white lateral patches on the prothorax not extending over the whole of the flanks, and separated from the patch on the front of the prosternum; the apical spots on the elytra, and those on the second ventral segment also, wanting, the second elytral spot oblique.

Lab. COSTA RICA, Turrialba (*ex coll. Schild-Burgdorf*).

Easily recognized by the comparatively smooth, shining surface and the large patches of chalky-white or ochreous scales above and beneath—one along each side of the

prothorax, extending over the whole of the flanks; one, large and oblique, at the sides of the elytra before the middle, extending downward over the sides of the metasternum; one below this, transverse, and another at the apex; and one on each side of the second ventral segment. The posterior tibiæ have a dense fringe of long ochreous hairs along the inner edge from the middle to the apex in the male, and a fringe of short whitish hairs in the female. The ventral depression of the male is shallow.

The variety is represented by a single specimen (♀) presented to us by Dr. Heller.

2. **Ambates polymorphus**, sp. n. (Tab. IX. figg. 11, ♂; 12 ♂, 13 ♀, vars.)

Elongate, shining, black, the legs sometimes in part ferruginous; the prothorax with a broad vitta on each side, extending forward on to the head and rostrum, and another on the lower part of the flanks, the elytra each with a broad sinuous submarginal vitta extending from the base to the apex, a large patch at the side of the metasternum, another at the side of the second ventral segment, and a small lateral spot on the second or second and third segments, densely clothed with oval yellowish-white scales, the vestiture of the rest of the surface very fine, blackish or fuscous, the metasternum and abdomen with a broad space down the middle almost bare. Rostrum very stout, strongly arcuate, bent downwards at one-third from the tip, carinate and coarsely punctate to about the middle and more finely punctate thence to the apex, a little smoother in the ♀. Prothorax nearly as long as broad, subconical, slightly rounded at the sides; closely, finely punctate, and with indications of a smooth median line. Elytra elongate, with rows of fine punctures placed in shallow striæ, the interstices flat and minutely punctate, the subapical callosities prominent. Ventral segments 1 and 2 broadly excavate down the middle, and 5 with a large shallow depression, and the posterior tibiæ strongly ciliate within, in the ♂.

Var. α. The sinuous elytral vitta connected laterally with the metasternal patch.

Var. β. The sinuous elytral vitta interrupted at the middle, the apex of the anterior portion extending more or less inward towards the suture, the posterior portion curved.

Length $8\frac{1}{2}$ – $10\frac{1}{2}$, breadth $3\frac{1}{4}$ – $3\frac{3}{4}$ millim. (♂ ♀.)

Hab. COSTA RICA, Irazu (*Rogers*: var. α); PANAMA, Chiriqui (*coll. Fry*: var. β), Bugaba, Volcan de Chiriqui (*Champion*: all three forms).

Nine specimens, four belonging to the form selected as typical. The broad, complete or interrupted submarginal stripe, which always reaches the apex, the maculate sides of the body beneath, the prominent subapical callosities, and the ciliate posterior tibiæ of the male, readily distinguish *A. polymorphus*. Several species of *Heilipus* vary in a somewhat similar way. The propleural stripe is evanescent in the varietal forms.

3. **Ambates heilipoides**. (Tab. IX. figg. 14, 14 a, ♂; 15, ♂, var.)

Ambates heilipoides, Chevr. Ann. Soc. Ent. Fr. 1877, p. 343¹.

Var. The white sinuous lateral vitta of the elytra interrupted posteriorly.

Hab. MEXICO, San Andres Tuxtla (*Sallé*), Teapa (*Pilate*¹, *H. H. Smith*); GUATEMALA, Teleman in Vera Paz (*Champion*).

Of this species we possess five specimens from Teapa, one from San Andres, and one from Teleman, the last-named (fig. 15) having the broad whitish stripe on the outer part of each elytron abruptly interrupted posteriorly. In this insect the vestiture of the under surface is entirely brownish. The first two ventral segments

are broadly depressed down the middle in the male, and the rostrum in this sex is more rugose than in the female.

4. **Ambates albovittatus**, sp. n. (Tab. IX. figg. 16, 16 a, ♂.)

Elongate, shining, black or nigro-piceous; the prothorax with a broad vitta on each side, extending forward on to the intraocular portion of the head, the elytra with a broad marginal vitta, curving inward towards the suture before the apex and extending broadly downward on to the lateral portion of the metasternum, and the scutellum, densely clothed with oval yellowish-white scales, the rest of the upper surface rather sparsely clothed with brownish, and that of the under surface with whitish, piliform scales. Rostrum very stout, strongly arcuate, closely punctate and tricarinate. Prothorax subconical, slightly rounded at the sides, nearly as long as broad, closely, finely, rugulose punctate. Elytra elongate, finely punctate-striate, the interstices flat and minutely punctate. Beneath closely punctate; ventral segments 1 and 2 broadly depressed down the middle in the ♂.

Length 8-9 $\frac{1}{2}$, breadth 3-3 $\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One pair. Very like the more northern *A. heilipoides*, but with the marginal white stripe of the elytra extending broadly downward on to the lateral portion of the metasternum, and not excised on its inner or outer edge, the vestiture of the rest of the upper surface brownish. The non-ciliate posterior tibiæ of the male, the unspotted abdomen, and the abbreviated, posteriorly curved marginal stripe of the elytra distinguish *A. albovittatus* from all the forms of *A. polymorphus*.

5. **Ambates leucopleura**, sp. n. (Tab. IX. figg. 17, 17 a, ♂.)

Elongate, rather shining, black, the tibiæ and tarsi reddish in one specimen; the prothorax and elytra with a continuous narrow submarginal vitta, extending forward on to the head and rostrum, and the entire under surface, a broad bare space down the middle of the metasternum and abdomen excepted, densely clothed with ochreous or yellowish-white scales, the elytra in one specimen with small clusters of similarly-coloured scales placed along the striæ, the rest of the vestiture of the upper surface very fine, fuscous, that of the legs yellowish. Rostrum longer than the head and prothorax, strongly arcuate, stout, rugulose punctate and tricarinate to beyond the middle, sparsely punctured at the tip. Joints 1 and 2 of the funiculus equal in length. Prothorax almost as long as broad, rounded at the sides anteriorly, feebly constricted and much narrowed in front; densely, finely, rugulose punctate, with indications of a smooth median line. Elytra elongate, finely punctate-striate, the interstices closely, minutely punctate. Ventral segments with the bare central portion very sparsely punctate, and 1 and 2 broadly excavate down the middle, in the ♂. Tarsal claws free.

Length 7 $\frac{1}{10}$ -7 $\frac{1}{5}$, breadth 2 $\frac{1}{2}$ -2 $\frac{4}{5}$ millim. (♂.)

Var. Smaller, the dark vestiture of the upper surface denser and more or less metallic; the elytra more finely striate, the interstices flat throughout and densely punctulate.

Length 4 $\frac{4}{5}$ -5, breadth 1 $\frac{2}{3}$ -2 millim. (♂ ♀.)

Hab. COSTA RICA, Carrillo (*Underwood*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Eight specimens, two only belonging to the larger form. Closely related to the S.-American *A. quadrilineatus* (Fabr.), but more shining, the metasternum and abdomen with a broad, bare space down the middle, the sides of the body beneath

(the flanks of the prothorax included) densely squamose; the prothorax more finely punctate. The bare median space on the abdomen becomes wider towards the apex, extending over the greater part of the segments 3-5, and is much smoother in the male than in the female. The antennæ are inserted at about the middle of the rostrum.

6. **Ambates latevittatus**, sp. n. (Tab. IX. fig. 18, ♂.)

Elongate, piceous or rufo-piceous; the prothorax and elytra with a broad dense, continuous, submarginal vitta of rather coarse, overlapping ochreous scales on each side, extending forward on to the head and rostrum, the rest of the upper surface thickly clothed with small fuscous scales (the elytra sometimes with a few ochreous scales along the first stria); the under surface in great part (the ventral segments 3-5, and the excavation in the ♂, excepted) densely set with rather coarse yellowish-white scales, the vestiture of the legs sparse and similarly coloured. Rostrum very stout, strongly arcuate, not longer than the head and prothorax, densely, rugulosely punctate and tricarinate, smoother at the tip. Joint 2 of the funiculus shorter than 1. Prothorax broader than long, opaque, densely, finely punctate. Elytra long, finely punctate-striate, the interstices flat and closely punctate throughout. Ventral segments 1 and 2 excavate down the middle in the ♂.

Length $3\frac{7}{8}$ -5, breadth $1\frac{1}{2}$ -2 millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Fourteen specimens. Very like the smallest examples of *A. leucopleura*, but with a broader, ochreous, submarginal vitta, a shorter rostrum, the antennæ inserted nearer its tip, the second joint of the funiculus not so long as the first. There are many allied S.-American forms.

7. **Ambates sinuatus**, sp. n. (Tab. IX. fig. 19, ♀.)

Elongate, dull, nigro-piceous, the legs sometimes in part ferruginous; the prothorax and elytra with a very broad, dense, continuous, submarginal vitta of oval ochreous scales on each side, extending forward on to the head and rostrum, the elytral vittæ sinuous, excised on their inner edge below the base and at the middle, and sometimes coalescent at the apex, the rest of the upper surface thickly clothed with intermixed blackish and ochreous scales; the sides of the metasternum and abdomen closely, and the median portion and legs very sparsely, ochreo-squamose. Rostrum stout, arcuate, densely, rugulosely punctate and tricarinate, smoother at the tip. Prothorax nearly as long as broad, densely, finely punctate. Elytra long, finely punctate-striate, the interstices flat and densely punctate. Ventral segments 1 and 2 deeply excavate down the middle in the ♂.

Length $5\frac{1}{2}$ -6 $\frac{4}{5}$, breadth 2-2 $\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Four specimens. In this insect the very broad complete ochreous vittæ of the elytra are deeply excised on their inner edge at about the middle, the rest of their dorsal surface is opaque, and the sides of the body beneath (the metathoracic episterna excepted) are somewhat thickly squamose. The following is a closely allied form.

8. **Ambates rhombifer**, sp. n. (Tab. IX. figg. 20, 20 a, ♀.)

Elongate, shining, rufo-piceous; the prothorax and elytra with a very broad continuous vitta on the outer part of the disc, extending forward on to the head and rostrum—the elytral vittæ not quite reaching the

subapical callosities, extending inward to near the suture, and deeply triangularly excised at the middle, —an oblong spot near the outer margin of each elytron at the apex, and the lower part of the propleura, densely clothed with narrow ochreous scales, the rest of the vestiture sparse and fine, fuscous above and cinereous beneath. Rostrum strongly arcuate, stout, thickly punctate, rugose and carinate at the base. Joint 2 of the funiculus a little longer than 1. Prothorax slightly broader than long, densely, finely, rugulosely punctate. Elytra long, finely punctate-striate, the interstices flat, closely, minutely punctate.

Ventral segments 1 and 2 broadly excavate down the middle in the ♂.

Length $5\frac{3}{5}$ – $6\frac{1}{5}$, breadth 2 – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Three specimens. Less opaque than *A. sinuatus*, the elytral vittæ still broader, not reaching the apex, and separated by a narrow dark sutural stripe, which is widened out at the middle into a large rhomboidal patch, the vittæ themselves clothed with narrower scales, the vestiture of the under surface much sparser.

9. *Ambates belti*, sp. n. (Tab. IX. figg. 21, 21 a, ♀.)

Moderately elongate, opaque, piceous, the rostrum, antennæ, and legs more or less ferruginous; the prothorax with a vitta on each side, extending on to the head and rostrum, and a faint median line, and the elytra with a sinuous posteriorly abbreviated stripe on the outer part of the disc, the sides, a line along the suture, and various others exterior to it at the base, and an oblong spot at the apex, densely clothed with pale ochreous scales, the elytral vittæ bordered within by a broad, sinuous, blackish or brown stripe and towards the apex externally by an oblong dark patch; the rest of the vestiture of the upper surface brownish, that of the under surface dense and whitish. Rostrum longer than the head and prothorax, strongly arcuate, moderately stout, carinate and rugulosely punctate, the apical half sparsely and very finely punctate. Joints 1 and 2 of the funiculus equal in length. Prothorax broader than long, rounded at the sides anteriorly; densely, finely, rugulosely punctate. Elytra finely punctate-striate, the interstices flat and densely punctate.

Length $4\frac{4}{5}$ –5, breadth $1\frac{7}{8}$ –2 millim. (♀.)

Hab. NICARAGUA, Chontales (*Belt*).

Two females. Near *A. triangularis*, but with the sinuous elytral vittæ much narrower, abruptly interrupted towards the apex (not below the base), and bordered within by a dark stripe, the rostrum (♀) smoother beyond the middle. The antennæ are inserted at about the middle of the rostrum.

10. *Ambates fasciolatus*, sp. n. (Tab. IX. fig. 22, ♀.)

Ambates fasciolatus, Chevr. Ann. Soc. Ent. Fr. 1877, p. 341¹.

Hab. MEXICO¹, Santacomapan in Vera Cruz (*Sallé*).

Of this species we have received a single female specimen. It may be identified by the common, narrow, curved, ochreous, impressed fascia at about the middle of the elytra, and the irregular patches of rust-red scales along the sides of the body beneath, the one on the second ventral segment being the most conspicuous. The second joint of the funiculus is longer than the first and the head is distinctly foveate between the eyes.

11. **Ambates obliquus**, sp. n. (Tab. IX. fig. 23, ♂.)

Ambates obliquus and *sallei*, Jekel, in litt.

Elongate, rather shining, black; clothed above and beneath with minute brown hair-like scales, the elytra each with a dense oblique fascia at about one-third from the apex (extending inward to the second or third stria), and sometimes some small scattered spots across the middle or around the seriate punctures, whitish or pale ochreous, the prothorax usually with indications of a faint oblique ochreous line on each side of the disc. Head with a small fovea between the eyes; rostrum arcuate, stout, thickly punctate and unicarinate, smoother and longer in the ♀; joint 2 of the funiculus much longer than 1. Prothorax transverse, subconical, closely, finely punctate. Elytra long, finely punctate-striate, the punctures conspicuous, the interstices closely punctulate. Ventral segments 1 and 2 broadly excavate down the middle in the ♂.

Length 7-10½, breadth 2⅔-3⅞ millim. (♂ ♀.)

Hab. MEXICO, Santacomapan and Toxpam in Vera Cruz (*Sallé*).

Six specimens. This is a form of *A. fasciolatus*, and occurs at the same locality, with the elytra obliquely and separately fasciate towards the apex, and the vestiture of the under surface uniformly coloured. It is distributed in various collections under Jekel's MS. names.

12. **Ambates sexpunctatus**, sp. n. (Tab. IX. figg. 24, 24 a, ♂.)

Elongate, rather shining, black; clothed above and beneath with minute brown hair-like scales, the prothorax with a faint oblique ochreous line on each side of the disc anteriorly, the elytra each with three small dense pale ochreous spots—one on the lower margin below the shoulder, one on the fifth interstice (extending inwards to the second stria in one specimen), and one on the third interstice towards the apex; the sides of the body beneath with intermixed coarser ochreous scales. Head foveate between the eyes; rostrum very stout, arcuate, rugosely punctate and tricarinate. Prothorax subconical, broader than long, finely, rugulosely punctate. Elytra long, finely punctate-striate, the punctures conspicuous, the interstices flat and closely punctulate. Ventral segments 1 and 2 broadly depressed down the middle in the ♂. Tarsal claws free.

Length 9, breadth 3⅓ millim. (♂.)

Hab. MEXICO, Misantla (*Höge*).

Two males. *A. sexpunctatus* is yet another form of *A. fasciolatus* that seems to require a separate name, all three inhabiting the Atlantic slope of Mexico, with three small pale ochreous spots on each elytron (constant in position, but varying in size) and a very stout, rugose, tricarinate rostrum.

13. **Ambates triangularis**, sp. n. (Tab. IX. fig. 25, ♂.)

Elongate, dull, piceous, the apex of the rostrum and the legs more or less ferruginous; the prothorax with a vitta on each side, extending on to the head and rostrum, and a faint median line, and the elytra with a strongly sinuate, broader, submarginal stripe, which is interrupted or much narrowed at about the basal fourth, densely clothed with ochreous scales; the elytra with a very large, common, triangular patch (sometimes narrowly divided along the suture) between the vittæ posteriorly, and an oblique streak exterior to them near the apex, black; the rest of the vestiture of the upper surface sparser, brownish or ochreous, that of the under surface (a broad space along the middle of the ventral segments 3-5 excepted) dense, whitish and ochreous intermixed. Rostrum strongly arcuate, stout, rugosely punctate and unicarinate, its apical third smoother. Joints 1 and 2 of the funiculus equal in length.

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Prothorax a little broader than long, rounded at the sides; densely, finely, rugulose punctate. Elytra long, finely punctate-striate, the interstices flat and densely punctulate. Ventral segments 1 and 2 broadly depressed down the middle in the ♂.

Length $4\frac{4}{5}$ – $5\frac{1}{5}$, breadth $1\frac{4}{5}$ –2 millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Three specimens. Distinguishable by the large triangular black patch between the broad, sinuous, anteriorly constricted or interrupted, ochreous vittæ of the elytra; the elytra also with a short black streak at the sides towards the apex, as in *A. tetrastigma*.

14. *Ambates tetrastigma*, sp. n. (Tab. IX. figg. 26, 26 a, ♀.)

Elongate, opaque, piceous, the apex of the rostrum, femora (except at the tip), and tibiæ ferruginous; thickly clothed with pale yellowish scales, the prothorax with a darker more sparsely squamose space down the middle and another on each flank, the elytra with an oblique pyriform spot near the suture at about the middle, and a short streak exterior to the subapical callosity, black; the vestiture of the under surface close at the sides and sparse down the middle. Head shallowly foveate between the eyes; rostrum strongly arcuate, stout, densely, rugosely punctate and carinate, smoother at the tip; joint 2 of the funiculus fully as long as 1. Prothorax nearly as long as broad, densely, finely punctate. Elytra long, obsolete punctate-striate, the striæ becoming distinct towards the suture, sides, and base, the interstices flat and densely, rugulose punctulate.

Length $5\frac{1}{2}$, breadth 2 millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Easily known by the close pallid vestiture, the two black marks on each elytron (the one near the suture oblique and pear-shaped), and the partially obliterated striæ.

15. *Ambates melanops*, sp. n. (Tab. IX. fig. 27, ♂.)

Elongate, shining, black; thickly clothed with minute cinereous or brownish, hair-like scales, the seriate punctures of the elytra flecked with white, the elytra each with a large, oblique, oval, velvety-black patch on the disc beyond the middle, bordered posteriorly with white scales; the vestiture of the under surface and legs (the ochreous soles of the tarsi excepted) also white, the ventral segments 3 and 4 (and the depressed portion of 1 in the ♂) almost bare. Rostrum stout, arcuate, rugulose punctate and feebly carinate, sparsely punctate at the tip, the apical portion smoother in the ♀. Prothorax transverse, rounded at the sides anteriorly, narrowed and constricted in front; densely, finely, confluent punctate. Elytra elongate-triangular, flattened on the disc anteriorly; with rows of somewhat widely separated punctures placed in fine shallow striæ, the interstices flat and closely punctulate. Ventral segments 1 and 2 broadly depressed down the middle, and the posterior tibiæ with a dense fringe of ochreous hairs along their inner edge from the middle to the apex, in the ♂.

Length $5\frac{3}{5}$ – $8\frac{1}{2}$, breadth $2\frac{1}{10}$ – $3\frac{1}{4}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Found in abundance in Chiriqui. Near *A. cæcus*, and with a similar large velvety-black patch on each elytron beyond the middle (which is not, however, surrounded by a dense ochreous line), the upper surface shining, the elytra less parallel, the posterior tibiæ strongly ciliate in the male. The antennæ are inserted beyond the middle of the rostrum in both sexes.

16. **Ambates cæcus.** (Tab. IX. fig. 28, ♀.)

Embates cæcus, Chevr. Col. Mex. cent. i. fasc. 1, no. 17 (1833) ¹.

Ambates cæsus (sic), Schönh. Gen. Curc. vii. 2, p. 153 ².

Hab. MEXICO ² (*ex coll. Flohr*), Toxpan and Santacomapan (*Sallé*), Playa Vicente (*Höge*), Orizaba ¹.

Apparently a common insect in the State of Vera Cruz. It is more elongate than the allied forms with a large, velvety-black, ochreous- or white-edged spot on each elytron; the prothorax is very little narrower than the elytra, and has, at most, a faint ochreous line on each side of the disc; the elytra are here and there flecked with white around the seriate punctures, and the black spot is more or less pointed near the suture behind. The male has the first two ventral segments broadly depressed down the middle.

17. **Ambates ocellatus**, sp. n. (Tab. IX. fig. 29, ♂.)

Ambates ocellatus, Jekel, in litt.

Moderately elongate, dull, black; the prothorax with a sharply-defined, whitish line on each side, extending forward on to the head and rostrum, the elytra each with an oblique, transverse, subangular, velvety-black, ochreous-edged patch on the disc (extending from the first to the sixth stria) midway between the base and apex; the rest of the vestiture of the upper surface sparser, brownish or ochreous (with a rosy flush in one specimen), that of the under surface yellowish-white. Rostrum arcuate, very stout, rugosely punctate and tricarinate. Prothorax broader than long, rounded at the sides, constricted and much narrowed in front, the sides subparallel at the base; densely, rugulosely punctate. Elytra much wider than the prothorax, elongate-triangular, the subapical callosities prominent; finely punctate-striate, the interstices flat, rugulosely punctulate, finely granulate at the base, 9 throughout, and 5 and 7 at their point of termination, narrowly costate. Femoral tooth large. Ventral segments 1 and 2 very deeply sulcate, and 5 with a small tuft of ochreous hairs in the middle, and the posterior tibiæ strongly ciliate on the inner side from the middle to the apex, in the ♂.

Length $5\frac{1}{2}$ – $6\frac{1}{4}$, breadth $2\frac{1}{10}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*: ♀), Teapa (*H. H. Smith*: ♂).

Two males and one female, one only in good condition. More elongate than *A. bisignatus*, the dense pallid submarginal line on the prothorax sharply defined, the elytral striæ more finely punctate, the subapical callosities prominent, the ventral depression of the male very deep and sulciform, the posterior tibiæ (as in *A. polymorphus*) ciliate within in this sex.

18. **Ambates nigronotatus**, sp. n. (Tab. IX. fig. 30, ♂.)

Elongate, opaque, black, the antennæ (the club excepted) ferruginous; the prothorax with a whitish vitta on each side, the elytra each with a very large, oblique, dense, brownish-black patch—bordered in front and behind with whitish scales—on the disc beyond the middle; the rest of the vestiture of the upper surface brown, intermixed with whitish or ochreous, that of the under surface paler. Rostrum very stout, arcuate, rugosely punctate and carinate. Prothorax broader than long, densely, rugulosely punctate. Elytra long, much wider than the prothorax, the interstices flat, rugulosely punctate. Ventral segments 1 and 2 with a broad, smoother, excavation down the middle.

Length $5\frac{2}{5}$, breadth 2 millim. (♂.)

Hab. GUATEMALA, Zapote (*Champion*).

One male, somewhat abraded. Near *A. ocellatus*, but with the black, white-edged patch more oblique, placed closer to the apex of the elytra, and reaching to near the suture, the ventral excavation broad and almost smooth, the posterior tibiae not ciliate. The form and position of the black spot also separate *A. nigrinotatus* from *A. biguttatus*.

19. *Ambates biguttatus*, sp. n. (Tab. IX. fig. 31, ♀.)

Moderately elongate, dull, black or piceous; the prothorax with a line on each side, extending forward on to the head and rostrum, and sometimes a line along the lower part of the flanks, ochreous or whitish, the elytra each with a very large, rounded or oblique, velvety-black spot—bordered all round with ochreous or whitish scales—on the disc a little beyond the middle; the rest of the vestiture of the upper surface brownish, that of the under surface paler and rather sparse. Rostrum arcuate, very stout, rugosely punctate and unicarinate. Prothorax broader than long, subconical, the sides parallel at the base; finely, rugulosely punctate, and sometimes obsolete carinate. Elytra much wider than the prothorax, elongate-triangular; finely punctate-striate, the interstices flat, rugulosely punctulate. Ventral segments 1 and 2 broadly excavate down the middle in the ♂.

Var. The black elytral spots larger, heart-shaped, followed by a curved whitish fascia and bordered in front with a few ochreous scales.

Length $4\frac{1}{2}$ – $7\frac{1}{2}$, breadth $1\frac{3}{4}$ –3 millim. (♂ ♀.)

Hab. MEXICO, Yolotepec in Oaxaca (*Sallé*), Playa Vicente (*Höge*), Teapa (*H. II. Smith*); GUATEMALA, Sinanja in Vera Paz, Cerro Zunil (*Champion*).

Nine specimens, the two from Teapa treated as a variety. Less elongate than *A. cæcus*, the elytra much broader than the prothorax, elongate-triangular, and with the black spot more rounded. The larger, rounded, elytral spot edged all round with ochreous, the spot itself placed nearer the apex and more distant from the suture, and the finely punctured elytral striae, separate *A. biguttatus* from *A. bisignatus*. The eye-like spots on the elytra are very similar to those of *Hilipus circuliferus*.

20. *Ambates pictipennis*, sp. n. (Tab. IX. fig. 32, ♂.)

Elongate, rather narrow, dull, piceous or rufo-piceous, the legs in great part ferruginous; the prothorax with a sharply-defined yellow line on each side, extending forward on to the head and rostrum and backward on to the base of the elytra, the elytra each with a large, velvety-black, pyriform spot on the disc a little beyond the middle, followed by an oblique, sinuous, yellow stripe, this latter bordered posteriorly with black and sometimes connected along the suture with a yellow apical streak; the rest of the vestiture of the upper surface sparser, brownish, sometimes with yellow scales intermixed, that of the under surface dense and whitish. Rostrum arcuate, stout, rugulosely punctate and finely carinate. Prothorax a little broader than long, subconical, rounded at the sides posteriorly, densely, rugulosely punctate. Elytra elongate, finely punctate-striate, the interstices flat and densely punctulate. Ventral segments 1 and 2 excavate down the middle in the ♂.

Length $4\frac{1}{5}$ – $4\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Three specimens. Very like the variable *A. biguttatus*, but with the prothoracic vittae sharply defined, the black spots on the elytra pyriform and followed by a sinuous, oblique, yellow stripe, which is sometimes connected with the yellow streak at the apex, the vestiture of the under surface dense and whitish.

21. **Ambates bisignatus.** (Tab. IX. figg. 33, 33 a, ♂.)

Ambates bisignatus, Chevr. Ann. Soc. Ent. Fr. 1877, p. 341¹.

Hab. MEXICO¹, Toxpan, Cordova, San Andres Tuxtla (*Sallé*), Teapa (*H. H. Smith*).

Sent us in some numbers from Teapa. In this insect the subangular velvety-black spot on each elytron is placed near the suture midway between the base and apex, and bordered behind with ochreous or whitish scales; the elytra themselves are much wider than the prothorax, elongate-triangular, finely striate, the striæ impressed with oblong punctures; the prothoracic vittæ are sharply defined; the prosternum is densely clothed with ochreous scales in front of the anterior coxæ; the rostrum is exceedingly stout, rugosely punctate and carinate to the tip. The broad ventral depression of the male is very shallow.

22. **Ambates duplicatus**, sp. n. (Tab. IX. fig. 34, ♀.)

Moderately elongate, opaque, rufo-piceous, the tibiæ, tarsi, and antennæ (the club excepted) ferruginous; the prothorax with a sinuous line on each side of the disc, extending forward on to the head, and another down the middle, ochreous, the elytra each with a large, oblong-quadrate, velvety-black patch at the middle of the disc, followed by a transverse yellow spot, the seriate punctures here and there surrounded by pallid scales; the rest of the vestiture of the upper surface sparser, brownish or ochreous, that of the under surface whitish, ochreous in front of the anterior coxæ. Rostrum arcuate, very stout, rugosely punctate and tricarinate. Prothorax transverse, rounded at the sides, constricted and much narrowed in front; densely, rugulosely punctate and feebly carinate. Elytra about one-half wider than the prothorax, flattened, triangular, the humeri and subapical callosities prominent; rather deeply punctate-striate, the interstices flat and densely rugulose. Ventral segments shining, with a broad, sparsely punctate, almost bare space down the middle.

Length 6, breadth $2\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Cerro de Plumas (*Höge*).

One specimen. Larger and broader than *A. bisignatus*, the black spots larger, oblong-subquadrate, and each followed by a transverse yellow patch, the prothorax more rounded at the sides and with a fine, sinuous, ochreous line on each side of the disc.

23. **Ambates exclamationis**, sp. n. (Tab. X. figg. 1, 1 a, ♀.)

Moderately elongate, opaque, nigro-piceous, the antennæ and tarsi ferruginous; clothed above with small dark brown and fulvous scales, the prothorax with an oblique, sharply-defined, whitish line on each side of the disc; the elytra each with an elongate, velvety-black, somewhat !-shaped mark on the disc beyond the middle, and a white spot enclosed in the lower portion of this mark and another slightly anterior to it on the outer margin; the vestiture of the under surface and legs sparse, in part whitish, the prosternum with a denser white patch in front. Rostrum exceedingly stout, arcuate, rugulosely punctate and finely carinate. Prothorax broader than long, abruptly narrowed and constricted in front; densely, rugulosely punctate. Elytra oblong-triangular, much wider than the prothorax; finely punctate-striate, the interstices flat and rugulosely punctate. Ventral segment 1 depressed down the middle in the ♂.

Length $3\frac{1}{2}$ –4, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, Zapote, Pacific slope (*Champion*).

Six examples. A small species, with albo-bilineate prothorax and a black !-shaped mark on the disc of each elytron, the rounded lower portion of this mark enclosing a white spot (which extends across the third and fourth interstices), similar to that on the outer margin.

24. *Ambates circumductus*, sp. n. (Tab. X. figg. 2, 2 *a*, ♀.)

Subovate, opaque, piceous; the prothorax with a faint median line and a narrow vitta on each side, the latter extending forward on to the head and restrum, and continued as a narrow curved stripe along the disc of each elytron to the suture at one-third from the tip (the two stripes here becoming coalescent, and often extending along the suture to the apex), ochreous or whitish, the elytra also each with a large, velvety, black or brownish-black, triangular patch in the posterior half of the space enclosed by the pale lines; the rest of the vestiture of the upper surface sparser, brownish intermixed with ochreous or cinereous, that of the under surface and legs rather coarse and close, white intermixed with ochreous. Restrurum strongly arcuate, very stout, rugosely punctate and carinate. Prothorax transverse, subconical, constricted in front; densely, rugulosely punctate. Elytra subtriangular, finely punctate-striate, the interstices rugulosely punctate. Ventral segments 1 and 2 shallowly depressed down the middle in the ♂.

Length $3\frac{7}{8}$ – $4\frac{1}{2}$, breadth 2 – $2\frac{1}{4}$ millim. (♂ ♀.)

Hab. PANAMA, David, Caldera, Tolé (*Champion*).

Not rare in the savana-region of Chiriqui, whence we possess sixteen examples. It is the only Central-American species with the continuous submarginal ochreous line on the upper surface extending round to the suture at one-third from the tip and enclosing a large triangular velvety-black patch at the middle of each elytron. The vestiture of the under surface is coarse. The elytra are shorter than in *A. solani*. An undescribed allied form (*A. dorsalis*, Jekel, in litt.) occurs in Colombia.

25. *Ambates solani*, sp. n. (Tab. X. figg. 3, 3 *a*, ♂; 4, ♂, var.)

Moderately elongate, dull, nigro-piceous or piceous, the legs wholly or in part ferruginous; the prothorax with a faint median line and another on each side, extending on to the head and rostrum, ochreous or cinereous, the elytra each with a large, oblong, velvety, black or brownish-black, patch on the middle of the disc near the suture (occupying about the median third), sometimes edged posteriorly with cinereous scales; the rest of the vestiture of the upper surface in great part brownish, the seriate elytral punctures usually surrounded by a few whitish scales; the under surface and legs with scattered, hair-like, whitish scales, the ante-coxal portion of the prosternum thickly clothed with ochreous or white scales. Rostrum strongly arcuate, exceedingly stout, laterally compressed, rugosely punctate and tricarinate, broadly sulcate beneath. Prothorax broader than long, subconical, feebly constricted in front; densely, rugulosely punctate. Elytra oblong-subtriangular, flattened on the disc, the humeri and subapical callosities rather prominent; finely punctate-striate, the interstices rugulosely punctate, the space covered by the blackish scales smoother and shining. Ventral segments 1 and 2 flattened or slightly depressed down the middle in the ♂.

Var. The prothorax conical; the velvety-black patch on each elytron longer and excised on its outer edge. Length $4\frac{1}{2}$ –6, breadth 2 – $2\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, San Gerónimo, San Juan, Tamahu, Teleman, Panzos, and Sinanja, all in Vera Paz (*Champion*); NICARAGUA, Chontales (*Janson*); COSTA RICA, San José, Arcangeles (*Biolley*); PANAMA, Bugaba, Volcan de Chiriqui, David (*Champion*).

A common insect in Central America, and found, according to Prof. Biolley, on a species of *Solanum*. The variety (three specimens from Chiriqui) is connected by intermediate forms. The elongate, velvety-black patch on each elytron (occupying the median third or more of their total length), the exceedingly stout, compressed rostrum, &c., distinguish this species, which is closely related to *A. bisignatus*.

26. *Ambates ornativentris*, sp. n. (Tab. X. figg. 5, 5 a, ♀.)

Oblong, broad, opaque, black; the elytra each with a large, elongate, irregular, velvety, black or dark brown, patch on the disc—extending from about the basal third to near the apex, and interrupted posteriorly,—edged here and there or on all sides with paler scales; the rest of the vestiture of the upper surface sparser, brownish or fulvous; the entire flanks of the prothorax, the prosternum, the mesosternum and side-pieces, the four anterior coxæ, and a broad patch at the middle of the basal half of the abdomen, densely clothed with white scales, the vestiture of the metasternum, the rest of the abdomen, and the legs in great part fulvous. Rostrum very stout, strongly arcuate, rugosely punctate and carinate. Prothorax transverse, rounded at the sides anteriorly, constricted and narrowed in front; densely, rugosely punctate, obsoletely carinate anteriorly. Elytra broad, subtriangular, the humeri and subapical callosities prominent; finely punctate-striate, the interstices densely rugulose. Ventral segments 1 and 2 broadly and shallowly depressed down the middle in the ♂.

Length $5\frac{1}{3}$ – $6\frac{1}{2}$, breadth $2\frac{1}{2}$ –3 millim. (♂ ♀.)

Hab. MEXICO, Toxpam (*Sallé*), Cerro de Plumas (*Höge*); GUATEMALA, Zapote (*Champion*).

Ten specimens, all but one from Mexico. Broader than *A. solani*, the elytra with an irregular spot beyond the elongate patch on the disc, the entire under surface of the prothorax, the mesosternum, and a large patch on the first two segments of the abdomen, densely clothed with white scales.

27. *Ambates scutiger*, sp. n. (Tab. X. figg. 6, 6 a, ♀.)

Elongate, opaque, nigro-piceous, the antennæ (the club excepted), tarsi, and apices of the tibiæ ferruginous; the prothorax with a median line and a vitta on each side, and the head and rostrum, clothed with minute, hair-like, flavo-cinereous scales; the elytra with a large, common, triangular, anteriorly evanescent, velvety, brownish-black patch at the middle of the disc; the rest of the vestiture sparse, flavo-cinereous, that of the under surface and legs coarser, whitish, dense on the prosternum and along the lower part of the flanks of the prothorax. Rostrum very stout, strongly arcuate, abruptly depressed at the base and flattened towards the apex, rugulosely punctate and carinate, smooth at the tip. Antennal club very large, ovate. Prothorax about as long as broad, narrowed and constricted in front, the sides parallel at the base; densely, rugulosely punctate. Elytra elongate, flattened on the anterior portion of the disc, the subapical callosities prominent; finely punctate-striate, the interstices densely rugulose. Beneath closely punctate.

Length $5\frac{2}{3}$, breadth $2\frac{1}{3}$ millim. (♀.)

Hab. GUATEMALA, Sinanja in Vera Paz (*Champion*).

One specimen. The velvety brownish-black patch on the elytra in this species is shaped very much as in *A. circumductus*, but the continuous ochreous line exterior to it is wanting, the lower part of the flanks of the prothorax is densely albo-squamose, the rostrum is abruptly depressed at the base and bent downwards towards the tip, the antennal club is larger, and the insect itself is much more elongate.

28. *Ambates angustatus*, sp. n. (Tab. X. fig. 7, ♀.)

Elongate, narrow, opaque, nigro-piceous, the antennæ (the club excepted), tarsi, and apices of the tibiae ferruginous; somewhat thickly clothed with minute flavo-cinereous scales, which are condensed on the prothorax into an oblique vitta on each side and a faint median line and on the elytra into various indeterminate patches, the elytra also with an inconspicuous, common, transverse, interrupted, dark brown median fascia (extending outwards to the fourth stria); the vestiture of the under surface rather coarse, close, and whitish, denser on the flanks of the prothorax. Rostrum evenly arcuate, stout, longer than the head and prothorax, rugulosely punctate and sharply carinate, the apical third much smoother. Prothorax as long as broad, parallel-sided, abruptly narrowed and constricted in front; densely, rugulosely punctate. Elytra long, flattened on the anterior portion of the disc; very finely punctate-striate, the interstices flat, densely rugulose.

Length $4\frac{1}{2}$, breadth $1\frac{3}{4}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Smaller and more parallel-sided than the Guatemalan *A. scutiger*, the rostrum evenly arcuate, the elytra more finely punctate-striate, and with the common dark dorsal patch reduced to an interrupted transverse streak. The antennæ are inserted at the middle of the rostrum.

29. *Ambates apicalis*, sp. n. (Tab. X. fig. 8, ♀.)

Moderately elongate, opaque, nigro-piceous, the antennæ, apices of the tibiae, and tarsi ferruginous; the prothorax with a sharply-defined line on each side of the disc, extending forward on to the head and backward on to the humeri, and the elytra with a small spot on the fifth interstice before the middle, and a common, narrow, transverse, subapical fascia, extending down the suture and disc to the apex, ochreous; the rest of the vestiture of the upper surface very sparse and fine, fuscous and ochreous, that of the under surface cinereous. Rostrum stout, arcuate, rugulosely punctate and subcarinate. Prothorax broader than long, rounded at the sides anteriorly, constricted and narrowed in front; densely, rugulosely punctate. Elytra long, much wider than the prothorax, subparallel in their basal half; finely punctate-striate, the interstices flat and rugulosely punctate.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Not unlike the Guatemalan *A. exclamationis*, but wanting the elongate velvety-black streak on the disc of each elytron, and with the ochreous scales clustered into a subapical transverse fascia and some markings at the apex, and a small spot on the fifth interstice before the middle. *A. buqueti*, Faust, from Venezuela, seems to be an allied form.

30. *Ambates vitticollis*. (Tab. X. fig. 9, ♂.)

Ambates vitticollis, Jekel, in litt.¹; Chevr. Bull. Soc. Ent. Fr. 1879, p. cxlix².

Elongate, dull, black; the prothorax with a broad vitta on each side, extending forward on to the head and rostrum, and a narrow median stripe, and the elytra with some irregular, coalescent markings at the apex, densely clothed with narrow ochreous scales, the rest of the elytral vestiture close and black, that of the under surface in great part fulvous at the sides and whitish down the middle to as far as the second ventral suture. Rostrum strongly arcuate, very stout, rather short, rugosely punctate and carinate, smoother at the tip. Prothorax transverse, rounded at the sides, constricted and narrowed in front; densely, rugulosely punctate. Elytra long, a little wider than the prothorax; very finely

punctate-striate, the interstices flat and densely punctulate. Ventral segments 1 and 2 broadly depressed down the middle in the ♂.

Length $4\frac{1}{2}$ –5, breadth $1\frac{7}{8}$ –2 millim. (♂.)

Hab. PANAMA, Taboga I. (*J. J. Walker*).—COLOMBIA (*Mus. Brit.*), Honda².

Two specimens, precisely similar. The broad ochreous lateral vitta of the prothorax is very conspicuous in this insect, contrasting with the black vestiture of the elytra, which is so close as to almost hide the fine striæ. The irregular ochreous markings at the apex, too, are sharply defined. *A. vitticollis* appears to be distributed in collections under Jekel's MS. name; and Chevrolat's description doubtless applies to the same species.

31. *Ambates albiventris*, sp. n. (Tab. X. figg. 10, 10 α, ♂.)

Elongate, subfusiform, dull; mottled above with a sparse clothing of small yellowish-white and fuscous scales, the sides of the prothorax (including the whole of the flanks), an oblique patch at the sides of the elytra below the base, a spot on each elytron near the apex, and the entire under surface, densely clothed with coarser, yellowish-white scales. Rostrum arcuate, moderately stout, about as long as the head and prothorax, rugulosely punctate at the base, and for the rest sparsely, very finely punctate, the antennæ inserted at the middle, joints 1 and 2 of the funiculus comparatively elongate. Prothorax rather convex, a little broader than long, gradually narrowing from the base, the sides rounded anteriorly; densely, rugulosely punctate. Elytra long, gradually narrowing from the base, flattened on the disc anteriorly; finely punctate-striate, the interstices flat, densely, rugulosely punctate and subgranulate. Ventral segments 1 and 2 broadly depressed down the middle. Legs rather long; tibiæ and tarsi comparatively slender, the posterior tibiæ sinuate within.

Length $5\frac{1}{5}$, breadth $2\frac{1}{3}$ millim. (♂.)

Hab. COSTA RICA, Reventazon, Plains of Santa Clara, Atlantic slope (*Biolley*).

A single specimen, rather worn, found in Dec. 1904. This insect is nearly related to *A. immaculatus*, from Chiriqui. The dense whitish vestiture of the lateral portions of the prothorax and of the under surface, the oblique whitish patch at the sides of the elytra beneath, the long rostrum, with the antennæ inserted at the middle, and the two yellowish-white subapical spots, sufficiently distinguish it.

32. *Ambates immaculatus*, sp. n. (Tab. X. figg. 11, 11 α, ♀.)

Elongate, dull, black, the antennæ (the club excepted) ferruginous, the tarsi piecous or rufescent; uniformly clothed above with minute, cinereous, hair-like scales; the vestiture of the under surface, femora, and tibiæ coarser and closer, wholly white, that of the tarsi ochreous, the ventral segments 3 and 4 in the ♀ and 3–5 in the ♂ with a narrow bare space down the middle. Rostrum arcuate, moderately stout, rugulosely punctate (and in one specimen earinate) at the base, for the rest sparsely, minutely punctate, the antennæ inserted at (♂) or behind (♀) the middle, joint 2 of the funiculus shorter than 1. Prothorax broader than long, gradually narrowing from the base, constricted in front; densely, rugulosely punctate and with indications of a raised median line. Elytra elongate, a little wider than the prothorax, depressed on the disc anteriorly, with prominent subapical callosities; finely punctate-striate, the interstices flat, densely, rugulosely punctate and subgranulate. Ventral segments 1 and 2 broadly depressed down the middle, and 5 with a shallow smooth fovea near the apex, in the ♂.

Length $5\frac{1}{2}$ – $6\frac{1}{5}$, breadth $2\frac{1}{8}$ – $2\frac{3}{5}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

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Three specimens. Near *A. albiventris*, but with the vestiture of the upper surface uniformly cinereous and that of the under surface much sparser and finer. Duller and more rugose than *A. melanops* and wanting the black spots on the elytra. The antennæ are inserted at about the middle of the rostrum.

33. *Ambates cleroides*, sp. n. (Tab. X. figg. 12, 12 a, ♂.)

Somewhat fusiform, black, the antennæ, the rostrum in part, the basal third or fourth of the elytra, and the legs, ferruginous; the vestiture fine: ochreous and dense between the eyes, white on the apical half of the rostrum, legs, and under surface (the ventral segments 3-5 almost bare); the prothorax with the anterior half black and the basal half ochreous; the elytra each with an arcuate, transverse fascia at about the middle (reaching inward to the first stria) and a common, large, apical spot ochreous, the broad intervening space velvety-black, the basal portion rust-red, the basal margin itself whitish and a narrow space in front of the curved fascia blackish. Head flattened between the eyes, deeply sunk into the prothorax, densely, finely punctate; rostrum strongly arcuate, stout, as long as the head and prothorax, closely punctate, carinate down the centre, the antennæ inserted at a little beyond the middle, joints 1 and 2 of the funiculus equal in length. Prothorax broader than long, transversely convex, constricted near the apex, the subapical groove sharply-defined beneath, the sides much rounded anteriorly and parallel behind; densely, very finely punctate. Elytra moderately long, triangular, flattened on the disc; finely punctate-striate, the interstices flat, densely, rugulose punctate, 7 and 8 finely costate for some distance below the base. Ventral segment 1 very broadly depressed down the middle. Femora strongly dentate.

Length $5\frac{1}{8}$ - $5\frac{1}{3}$, breadth $2\frac{2}{5}$ - $2\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, David, Bugaba (*Champion*).

Five specimens, probably all males. A remarkable insect, having the general appearance of a Clerid. The transversely convex prothorax, the flattened, triangular, sharply fasciate elytra, and the ochreous frons, give it a very distinct facies from any of the other species of *Ambates* here enumerated.

PTERACANTHUS.

Pteracanthus, Schönherr, Gen. Curc. vii. 2, p. 156 (1843); Lacordaire, Gen. Col. vi. p. 514.

This genus is based upon a single species from Tropical America, recognizable at a glance by the very long projecting humeral and subapical spines of the elytra, the non-sulcate prosternum, the contiguous anterior coxæ, and the sharply dentate femora. Some of the forms here placed under *Peridinetus* are very like it, but they want the elytral spines, and have the prosternum sulcate and the anterior coxæ separated by a narrow space.

1. *Pteracanthus smidti*. (Tab. X. fig. 13, ♂.)

Rhynchænus smidtii, Fabr. Syst. Eleuth. ii. p. 480¹.

Pteracanthus smidtii, Boh. in Schönh. Gen. Curc. vii. 2, p. 157²; Lacord. Gen. Col. vi. p. 514³.

Hab. PANAMA, Bugaba (*Champion*).—SOUTH AMERICA^{1 2}, Cayenne³.

We have a single specimen (♂) of this remarkable insect from Chiriqui. It has the first ventral segment depressed down the middle, and the antennæ inserted slightly behind the middle of the rostrum.

PSEUDAMBATES, nom. n.

Pseudocholus, Desbrochers, Ann. Soc. Ent. Belg. 1. p. 366 (nota) (Nov. 1906) (nec Lacordaire, 1866).

The type of this genus, *Ps. biplagiatus*, Desbr., from Costa Rica, is related to *Ambates*, mainly differing from it in the short-ovate, acuminate, antennal club, the wider scutellum, the more produced posterior angles of the second ventral segment, and the broad, rhomboidal, robust form of the body. The general coloration is very like that of *Ambates cretifer*, Pasc., and its allies. The mesothoracic epimera are greatly developed and ascending (a *Barid*-character separating *Pseudambates* from the *Cholina*), and the anterior coxæ are almost contiguous.

The generic name *Pseudocholus* is preoccupied in Rhynchophora, and must therefore be changed.

1. *Pseudambates biplagiatus*. (Tab. IX. figg. 10, 10 a, ♀.)

Pseudocholus biplagiatus, Desbr. Ann. Soc. Ent. Belg. 1. p. 366¹.

Subrhomboidal, broad, robust, shining, black; the prothorax with the flanks and under surface, the elytra each with a broad, oblique, curved fascia extending around the humeral callus from the base and a broad transverse fascia near the apex (almost reaching the suture), the metasternum, and the ventral surface in part (the outer portions of the second segment only in the ♂), densely clothed with white or pale ochreous scales, the legs with fine whitish hair-like scales, the rest of the surface almost bare. Head closely punctate, foveate between the eyes; rostrum stout, strongly arcuate, about as long as the head and prothorax, closely punctate, a little smoother in the ♀; joints 1 and 2 of the funiculus equal in length. Prothorax rather convex, broader than long, conical, rapidly narrowed from near the base, the sides a little rounded behind; closely, finely punctate, with indications of a narrow smooth median line. Elytra broad, subtriangular, flattened on the disc anteriorly, the humeri obliquely truncated in front; finely punctate-striate, the interstices closely, minutely punctate, flat, the alternate ones feebly costate at the apex. Ventral segments 1 and 2 broadly depressed down the middle in the ♂.

Length $8\frac{1}{2}$ – $8\frac{4}{5}$, breadth $4\frac{1}{2}$ millim. (♂ ♀.)

Hab. COSTA RICA, Reventazon (*Biolley*), San Carlos¹ (*ex. coll. Schild-Burgdorf*).

We have received two specimens of this species.

Sect. PERIDINETIDES.

*Péridinéti*des, Lacordaire.

Lacordaire included two Tropical-American genera in this section, one of which (*Peridinetus*) is well represented within our limits, the other (*Megops*, Schönh.) inhabiting Brazil.

PERIDINETUS.

Peridinetus, Schönherr, Gen. Curc. iv. p. 467 (1837), viii. 2, p. 56 (1844); Lacordaire, Gen. Col. vii. p. 210; Chevrolat, Ann. Soc. Ent. Belg. xxvi. p. 79 (1883) (part.); Jekel, Ann. Soc. Ent. Belg. xxvi. p. 84.

This genus, which is well represented within our limits, is closely related to *Ambates*, mainly differing from it in the sulcate prosternum, the non-contiguous anterior coxæ, and the less rapidly descending scrobes. The antennæ in the Central-American forms

(except in *P. trifasciatus* and *P. quadrimaculatus*) are inserted at the middle of the rostrum in both sexes; the metasternum is sometimes protuberant between the middle coxæ (*P. canus* and *P. cretaceus*); the femora are sharply dentate; and the tarsal claws are almost contiguous at the base. The males usually have the first one or two ventral segments depressed down the middle, and in one species (*P. quadrimaculatus*) the posterior tibiæ are strongly bisinuate in this sex. The smaller forms approach *Pteracanthus*.

Metasternum more or less protuberant between the middle coxæ.

Prothorax and elytra uniformly clothed with small, hair-like, white or cinereous scales; the elytra with the apical portion of the suture, and an oblique patch on the outer part of the disc, bare Species 1.

Prothorax and elytra with large chalky-white patches on each side, extending downward on to the lower surface Species 2.

Metasternum flattened between the middle coxæ.

Antennæ (except in *P. trifasciatus*) inserted at about the middle of the rostrum in both sexes.

Prothorax and elytra each with a large chalky-white lateral patch extending downward on to the under surface Species 3.

Prothorax immaculate; elytra with white marks or fasciæ extending downward on to the under surface Species 4-6.

Prothorax and elytra mottled with white and fulvous, their lateral portions white, like the under surface Species 7.

Prothorax and elytra opaque; the prothorax with an oblique yellowish-white stripe on each side, the two stripes coalescent at the apex; the elytra uneven, mottled on the disc with fulvous and black Species 8.

Prothorax with the anterior portion, and the head in front, carmine-red; elytra with the apex spotted or bare Species 9, 10.

Prothorax only with the anterior portion carmine-red; elytra with a large black patch at the base enclosing two white spots, the apex immaculate Species 11.

Prothorax and elytra variegated with ochreous, white, and black; the prothorax nodose and bifoveolate on the disc anteriorly Species 12.

Prothorax and elytra faintly mottled with ochreous and white, opaque; the prothorax nodose on each side Species 13.

Prothorax with three interrupted lines, and the elytra with a common sub-apical fascia, ochreous; the elytral interstices interruptedly costate Species 14.

Prothorax ochreo-vittate on each side; elytra each with one or two spots on the fourth interstice, and a lateral patch extending downward on to the metasternum, white Species 15.

Antennæ (♂) inserted near the apex of the rostrum; prothorax conical; elytra each with two black spots; posterior tibiæ (♂) strongly bisinuate Species 16.

1. *Peridinetus canus*, sp. n. (Tab. X. figg. 14, 14 a, ♂.)

Oblong-rhomboidal, shining, black; thickly clothed above and beneath with minute, hair-like, white or cinereous scales, with the following parts almost bare: the head (except around the eyes), a space down

the middle of the prothorax, the humeri, the apical third or more of the suture, a sharply-defined oblong oblique patch on the outer part of each elytron near the apex, and a broad space down the middle of the abdomen; the tarsi with ochreous hairs beneath. Head sparsely, finely punctate, deeply sulcate between the eyes; rostrum very stout, feebly arcuate, sparsely, minutely punctate (except along the middle), smoother in the ♀; joints 1 and 2 of the funiculus elongate, equal in length; antennal club long, acuminate-ovate. Prothorax conical, closely, finely punctate, with indications of a smooth raised median line. Elytra much wider than the prothorax, elongate-triangular; with rows of oblong punctures placed in fine striæ, the interstices closely punctate, flat, 2 and 4 narrowly costate at the apex. Metasternum and abdomen, except at the sides, very sparsely, finely punctate; ventral segment 1 broadly depressed down the middle in the ♂; metasternum binodose between the middle coxæ, its anterior face vertical.

Length $6\frac{2}{5}$ – $9\frac{3}{4}$, breadth $2\frac{1}{5}$ – $4\frac{2}{3}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

A common insect in the forest-region of Chiriqui. Nearly related to *P. cretaceus*, but wanting the chalky-white patches above and beneath, the vestiture close, fine, and uniform, cinereous or white, the elytra with the apical third or more of the suture and an oblique lateral patch near the tip bare. The metasternum is similarly formed in the two species. *P. canus* bears a superficial resemblance to *Ambates melanops* and inhabits the same region.

2. *Peridinetus cretaceus*. (Tab. X. figg. 15, 15 a, ♂.)

Peridinetus cretaceus, Pasc. Ann. & Mag. Nat. Hist. (5) v. p. 181 (1880)¹; Jekel, Ann. Soc. Ent. Belg. xxvi. p. 86².

Peridinetus luctuosus, Chevr. Ann. Soc. Ent. Belg. xxvi. p. 82 (1882)³.

Hab. NICARAGUA (*Sallé*³), Chontales^{1 2} (*Belt, Janson*); COSTA RICA, Guaitil de Pirris, San Carlos (*Biolley*), Azahar de Cartago, Savanillas de Pirris (*Underwood*), Cariblanco (*Lankester*), Caché (*Rogers*).—COLOMBIA, Buenaventura (*coll. Fry*).

The dense chalky-white patches in this insect are six in number:—one on each side of the prothorax, extending downward over the whole of the flanks; one at about the middle of each elytron, oblique, extending downward on to the lateral portion of the metasternum; and one on each elytron at the apex. The male has the first two ventral segments very broadly excavate down the middle. The first joint of the funiculus is longer than the second. The metasternum is somewhat protuberant between the middle coxæ, its anterior face vertical.

3. *Peridinetus distinctus*. (Tab. X. fig. 16, ♂.)

Peridinetus distinctus, Pasc. Ann. & Mag. Nat. Hist. (5) vi. p. 180¹; Chevr. Ann. Soc. Ent. Belg. xxvi. p. 82².

Peridinetus linnei, Jekel, in litt.³.

Peridinetus niveopictus, Chevr. in litt.⁴.

Hab. MEXICO^{1 2}, Santacomapan, Toxpam (*Sallé*), Teapa (*Höge, H. H. Smith*); BRITISH HONDURAS, Rio Sarstoon (*Blancaneaux*); GUATEMALA, San Gerónimo, Panima,

Purula, San Juan, Senahu, and Cubilguitz in Vera Paz, El Tumbador, Las Mercedes, Zapote, Capetillo (*Champion*).

Not rare on the Atlantic and Pacific slopes of Guatemala, and also found on the Atlantic slope of Mexico. Less elongate than *P. cretaceus*, and wanting the chalky-white apical patch on each elytron, the metasternum not protuberant between the middle coxæ. The male has the first ventral segment broadly excavate, and the fifth shallowly depressed, down the middle. The first joint of the funiculus is much longer than the second.

4. *Peridinetus trifasciatus*, sp. n. (Tab. X. figg. 17, 17 a, ♂.)

Oblong-rhomboidal, shining, black, the legs (the knees excepted) in great part ferruginous; the base of the rostrum, the head, the sides of the prothorax, and the upper half of the mesothoracic epimera, sparsely clothed with minute, hair-like, fulvous scales; the elytra with three broad, transverse, dense fasciæ of small, oval, pure white scales—one before the middle, extending obliquely forward at the sides and continued over the whole of the lateral portion of the metasternum, one beyond the middle, and one at the apex, the last two very narrowly separated,—the rest of their upper surface with a few hair-like scales similar to those on the prothorax; the ventral segments 2–4 with a spot on each side, and the apical half of 5, and the legs also, clothed with white scales. Head minutely punctate, deeply sulcate between the eyes; rostrum very stout, arcuate, slightly longer than the prothorax, sparsely, minutely punctate, the antennæ inserted at a little beyond the middle, joint 2 of the funiculus fully as long as 1, the club rather long, acuminate-ovate. Prothorax conical, slightly broader than long, constricted at the sides in front; sparsely, minutely punctate. Elytra elongate-triangular; finely punctate-striate, the interstices flat, closely, minutely punctate, the bare spaces almost smooth. Metasternum depressed between the middle coxæ. Ventral segments 1 and 2 broadly depressed down the middle. Posterior tibiæ strongly sinuate.

Length $8\frac{1}{4}$, breadth $3\frac{3}{8}$ millim. (♂.)

Hab. PANAMA, Chiriqui (*coll. Fry*).

One male, probably found by Trötsch. The three broad, dense, pure white, narrowly separated, transverse fasciæ of the elytra, the deeply sulcate frons, &c., readily distinguish *P. trifasciatus*.

5. *Peridinetus melastomæ*, sp. n. (Tab. X. figg. 18, 18 a, ♂.)

Oblong-rhomboidal, shining, nigro-piceous or piceous (the rostrum, antennæ, and legs, in part, ferruginous in one specimen); the elytra with a space along their lower margin, the apex, a faint transverse subapical fascia, and an oblique, evanescent fascia on the disc at about the middle, the metasternum (densely), a spot on each side of the ventral segments 2–5, and the legs in part, clothed with small pure white scales; the rest of the upper surface and legs, the flanks of the prothorax, and the mesothoracic side-pieces, with narrow, hair-like, ochreous scales, the rest of the ventral segments almost bare. Head minutely punctate, deeply sulcate between the eyes; rostrum strongly arcuate, stout, sparsely, minutely punctate; joints 1 and 2 of the funiculus equal in length. Prothorax conical, closely, finely punctate, with indications of a smooth raised median line. Elytra elongate-triangular, obliquely depressed on the disc below the base and at the sides beyond the middle; finely punctate-striate, the interstices almost flat and closely punctulate, 3 narrowly costate near the apex. Ventral segment 1 depressed down the middle posteriorly, and the posterior tibiæ sinuate, in the ♂.

Length $6\frac{3}{4}$ –9, breadth 3–4 millim. (♂ ♀.)

Hab. COSTA RICA, Arcangeles 1500 metres (*Biolley*).

Two specimens, assumed to be male and female, one having the posterior tibiae more sinuate than the other. Found in Dec. 1898, upon a species of Melastomaceæ, according to Prof. Biolley. The ground-colour, at first sight, appears to be olivaceous, and the vestiture of the faint, evanescent, elytral fasciæ bluish-white. The much sparser and finer vestiture of the fasciæ and the closely punctured, less constricted prothorax separate *P. melastomæ* from *P. trifasciatus*.

6. *Peridinetus lateralis*, sp. n. (Tab. X. figg. 19, 19 a, ♂.)

Elongate, subfusiform, shining, piceous, the head, rostrum, antennæ, mesothoracic epimera, and legs more or less ferruginous; the elytra with a space along their lower margin, the apex, a narrow, interrupted, subapical fascia, and various small scattered patches between this and the basal third, the metasternum (densely), the ventral segments 2 and 5 in part, a space down the middle of 1, and a spot on each side of 3 and 4, and the outer half of the posterior femora, clothed with small, oval, pure white scales; the rest of the upper surface, the flanks of the prothorax, and the mesothoracic epimera, with scattered, minute, hair-like, fulvous scales. Head dull, minutely punctate, narrowly sulcate between the eyes; rostrum arcuate, stout, very sparsely, finely punctate; joints 1 and 2 of the funiculus equal in length. Prothorax conical, constricted at the sides in front; closely, finely punctate, with indications of a smooth, raised median line. Elytra elongate-triangular, obliquely depressed on the disc below the base; finely punctate-striate, the interstices almost flat, minutely punctulate, 3 narrowly costate near the apex. Ventral segments with the bare spaces smooth, 1 depressed down the middle.

Length $7\frac{1}{3}$, breadth $3\frac{1}{10}$ millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 8000 feet (*Champion*).

One specimen, found in the bamboo-thickets high up on the Pacific slope of the Volcan de Chiriqui. More elongate than *P. irroratus*, the vestiture of the prothorax and of the base of the elytra very fine and uniformly fulvous, the apical two-thirds only of the latter mottled with patches of coarser white scales above. The elytra are rather narrower at the base than in *P. trifasciatus* and *P. melastomæ*, and the frontal sulcus is shallower and less extended. *P. zinckenii*, Ros., is another allied form.

7. *Peridinetus irroratus*. (Tab. X. figg. 20, 20 a, ♂.)

Curculio irroratus, Fabr. Mant. Ins. i. p. 106¹; Ent. Syst. i. p. 429².

Rhynchænus irroratus, Fabr. Syst. Eleuth. ii. p. 467³.

Peridinetus irroratus, Ros. in Schönh. Gen. Curc. iv. p. 468⁴; Chevr. Ann. Soc. Ent. Belg. xxvi. p. 79⁵.

Var. *Peridinetus (Rhinobatus) marmoratus* [*marmoreus*] (Dej.), Chevr. loc. cit.⁶.

Hab. NICARAGUA, Chontales (*Belt*); COSTA RICA, San José, Chirripo, Turrialba, La Laguna, Carrillo (*Biolley*), Azahar de Cartago, Savanillas de Pirris (*Underwood*); PANAMA (*Boucard*), Chiriqui (*Ribbe*), Bugaba, Volcan de Chiriqui (*Champion*).—SOUTH AMERICA, Cayenne¹⁻⁵, Brazil⁴, Para⁶.

A common insect in Costa Rica and found, according to Prof. Biolley, on a species of *Piper*. In fresh examples the interspaces between the white patches on the dorsal surface of the head, prothorax, and elytra are thickly clothed with minute hair-like

fulvous scales. The male has the fifth ventral segment slightly depressed in the middle and the intermediate tibiae excavate on the inner side near the apex. The var. *marmoratus* appears to be based on partially abraded examples.

8. *Peridinetus collaris*, sp. n. (Tab. X. figg. 21, 21 a, ♂.)

Subovate, robust, opaque, black, the tarsi ferruginous; the vestiture very fine, in great part fulvous, rather close on the head and prothorax, and sparse on the rest of the surface; the prothorax with a broad, oblique, dense, pale ochreous band on each side, extending downward on to the flanks posteriorly (not reaching the hind angles, as seen from above), and continued on to the mesothoracic epimera, the two bands becoming coalescent at the apex (in one specimen continued on to the vertex); the elytra mottled with black across the middle and towards the apex; the legs and ventral surface with scattered intermixed fulvous and white, hair-like scales, the tarsi with ochreous hairs. Head sulcate between the eyes; rostrum very stout, feebly arcuate, not longer than the prothorax, finely, very sparsely punctate; joint 1 of the funiculus much longer than 2. Prothorax broader than long, convex, rounded at the sides, abruptly narrowed in front, strongly bisinuate at the base; closely, minutely punctate. Elytra moderately long, broad, triangular, transversely depressed before and beyond the middle, the intervening portions of the interstices 3 and 5 somewhat swollen; finely punctate-striate, the interstices closely punctulate, flat, 9 faintly, narrowly costate. Ventral segments sparsely punctate; 1 excavate down the middle posteriorly, and 5 also depressed at the apex and with its apical margin emarginate, in the ♂.

Length 8, breadth $3\frac{3}{4}$ millim. (♂.)

Hab. MEXICO, Toxpan (*Sallé*), Cerro de Plumas (*Höge*).

Two specimens. The uneven elytra, the anteriorly coalescent, downwardly-directed, dense ochreous lateral bands on the prothorax, &c., distinguish *P. collaris*.

9. *Peridinetus coccineifrons*, sp. n. (Tab. X. figg. 22, 22 a, ♂.)

Elongate, shining, black, the antennal scape and the legs in great part (the anterior femora excepted) ferruginous; clothed with small hair-like scales: the head and the anterior lobe of the prothorax carmine-red, the sides of the metasternum with a broad oblique ochreous patch; the rest of the vestiture sparse, white along the middle and sides of the posterior lobe of the prothorax, at the base of the third interstice and at the apex of the elytra (where it is condensed into a narrow stripe on the third interstice), and at the sides of the abdomen, and brownish or ochreous elsewhere, that of the legs ochreous and white intermixed, the elytra each with an apical spot and the base almost bare. Head shallowly sulcate between the eyes; rostrum very stout, feebly arcuate, depressed at the base, not longer than the prothorax, almost smooth; joint 1 of the funiculus longer than 2. Prothorax nearly as long as broad, subconical, the short anterior lobe narrower and tubulate; closely, minutely punctate, with indications of a smooth median line. Elytra much wider than the prothorax, elongate-triangular, each obliquely depressed on the disc below the base; finely punctate-striate, the interstices rugulose, becoming narrowly costate towards the apex. Ventral segments closely punctate and squamose at the sides only, for the rest bare and very sparsely punctured, 1 broadly flattened down the middle in the ♂.

Length $5\frac{1}{2}$ – $5\frac{7}{8}$, breadth $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two specimens, one somewhat immature. Amongst the species with the vestiture of the head and anterior portion of the prothorax carmine-red, the present insect is easily recognizable by its elongate shape and the costate apical interstices of the elytra. *P. coccineifrons* has the general facies (except that the elytral spines are wanting) and coloration of *Pteracanthus smidti*.

10. *Peridinetus rufotorquatus*, sp. n. (Tab. X. figg. 23, 23 a, ♂.)

Subovate, rather shining, black or piceous, the prothorax with a brassy lustre, the antennæ, tibiæ, and tarsi, and sometimes the apex of the prothorax also, ferruginous; the anterior portion of the head and the anterior lobe of the prothorax (except in the middle, behind) thickly clothed with hair-like, carmine-red scales, the base of the rostrum, vertex, and a narrow space down the middle of the posterior lobe of the prothorax, and another along each lateral margin, with ochreous or white hair-like scales; the elytra—a narrow transverse scutellar patch, the humeri, and a sharply-defined transverse space at the apex excepted—closely set with very small, seriatly-arranged, oval, brownish-ochreous scales, the second stria with a short white streak at the base; the vestiture of the under surface very sparse, in great part white on the metasternum. Head shallowly sulcate between the eyes; rostrum arcuate, depressed at the base, very sparsely, minutely punctate, smoother in the ♀; joint 1 of the funiculus longer than 2. Prothorax nearly as long as broad, conical; the anterior lobe closely punctate, somewhat swollen on each side of the short, arcuate, prominent, median carina; the posterior lobe almost bare, transversely depressed in front, with a few scattered transverse punctures. Elytra comparatively broad, subtriangular, flattened, transversely depressed at the apex and obliquely so on the disc below the base; finely punctate-striate, the interstices (except at the apex) almost flat and densely punctulate. Ventral segments very sparsely punctate, 2-4 almost smooth.

Length 3-4, breadth $1\frac{1}{2}$ -2 millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Chacoj and San Juan in Vera Paz (*Champion*).

Fourteen specimens. Smaller and less elongate than *P. coccineifrons*; the posterior lobe of the prothorax much smoother than the anterior lobe and almost bare, the anterior lobe arcuato-carinate; the elytra with a sharply-defined, almost bare, depressed space at the apex, the interstices each with three or four rows of minute oval scales and not costate; the metasternum without ochreous lateral patch.

If the sexes are rightly identified, the male is without definite ventral depression.

11. *Peridinetus lætus*, sp. n. (Tab. X. figg. 24, 24 a, ♀.)

Subovate, black, the antennæ, apex of the rostrum, head, and tibiæ more or less ferruginous; the vestiture fine and close, that on the head and base of the rostrum sparser, fulvous or ochreous: the anterior portion of the prothorax carmine-red, the posterior portion black; the elytra with a broad, transverse, posteriorly rounded space at the base (extending outward to the sixth stria), enclosing a white spot on each side of the scutellum, and a patch at the sides below the humeri, black, the remaining portion ochreous, the alternate interstices faintly lineate with white towards the apex; the legs and under surface with scattered narrow whitish scales, the second ventral segment almost bare. Rostrum arcuate, stout, not longer than the prothorax, finely, sparsely punctate and feebly carinate, smoother in the ♀. Joints 1 and 2 of the funiculus subequal in length. Prothorax transverse, the short anterior lobe narrow and tubulate, the posterior lobe transversely convex; closely, minutely punctate, and subcarinate. Elytra much wider than the prothorax, triangular, flattened on the disc; finely punctate-striate, the interstices almost flat, densely punctulate, 7 throughout, and 9 from about the middle onward, feebly, narrowly costate. Ventral segments 1 and 2 depressed down the middle in the ♂.

Length $4\frac{1}{2}$, breadth 2 millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. Near *P. rufotorquatus*, but with the prothorax differently shaped; the elytra with a large black patch at the base (enclosing two white spots), the bare

apical patch wanting, and the seventh interstice narrowly costate throughout. There is a very closely allied unnamed form from Peru in the Fry collection.

12. *Peridinetus nodicollis*, sp. n. (Tab. IX. figg. 25, 25 a.)

Subovate, shining, black, the rostrum, antennæ, meso- and metathoracic side-pieces, legs (the anterior and intermediate femora excepted), and the sides of the elytra at about the middle, ferruginous; the head in front, the prothorax with two oblique lines on each side posteriorly, and the anterior lobe, clothed with narrow, intermixed, ochreous and white scales, the prothorax also with a dense cluster of short, erect, ochreous scales, enclosing a black spot, on each side of the disc before the middle; the elytra with a broad space across the centre, extending forward along the sutural region to the base, variegated with ochreous, white, and black scales (the black scales clustered into an oblong spot on the second interstice, and a transverse streak below it across the interstices 3-6), the rest of their surface almost bare; the metasternum (the ochreous episterna excepted), and an annulus near the apex of the hind femora, with white scales. Head minutely punctate, shallowly sulcate between the eyes and foveate on the vertex; rostrum stout, arcuate, finely punctate at the base; joints 1 and 2 of the funiculus subequal in length. Prothorax transverse, abruptly narrowed and strongly constricted in front, the sides parallel at the base; the posterior lobe somewhat gibbous in the middle anteriorly and depressed on each side of this, the median trilobate space smooth and bare; the flanks somewhat hollowed and with a few coarse scattered punctures. Elytra triangular, with the humeri and subapical callosities rather prominent; finely punctate-striate, the interstices punctulate (except at the tip), 2 costate at the apex. Ventral segments almost smooth, squamose along their outer margin only.

Length $3\frac{1}{3}$ - $3\frac{2}{3}$, breadth $1\frac{2}{5}$ - $1\frac{7}{8}$ millim.

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two specimens, probably male and female. Not unlike the S.-American *P. sellatus*, Boh., but narrower and less robust, the elytra triangular, the prothorax gibbous on the disc anteriorly and with a smooth trilobate space in the middle, the markings very different, &c. *P. nodicollis* has the general facies of a *Conotrachelus*. The prothorax appears to be margined at the sides, as seen from above.

13. *Peridinetus opacus*, sp. n. (Tab. X. fig. 26.)

Oblong, opaque, nigro-piceous or piceous, the antennæ and tarsi ferruginous; sparsely clothed with very minute, hair-like, ochreous and white scales, which on the prothorax and elytra are clustered into small scattered patches, the vestiture of the head and prothorax entirely ochreous, that of the elytra partly white. Rostrum arcuate, very stout, sparsely, finely punctate, obsoletely carinate at the base. Joint 2 of the funiculus shorter than 1. Prothorax transverse, strongly constricted and abruptly narrowed in front, the sides parallel behind; closely, finely punctate. Elytra much wider than the prothorax, narrowing from the base; finely punctate-striate, the interstices densely punctulate, the alternate ones narrowly costate at the apex. Beneath very sparsely punctate.

Length $3\frac{1}{3}$, breadth $1\frac{2}{5}$ millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens. In this insect the upper surface is opaque, and clothed with small scattered patches of minute, ochreous and white, hair-like scales; and the prothorax is so abruptly narrowed anteriorly as to appear nodose on each side. *P. opacus* is perhaps most nearly allied to *P. nodicollis*, though very dissimilar in appearance. It might easily be mistaken for a small Cryptorrhynchid.

14. *Peridinetus costatus*, sp. n. (Tab. X. figg. 27, 27 a.)

Oblong ovate, piceous, the antennæ, tibiæ, and tarsi ferruginous; the head, an interrupted vitta on each side of the prothorax, as well as a faint median line, and a common, transverse, fascia on the disc of the elytra at about one-third from the apex, clothed with small, hair-like, ochreous scales, the rest of the vestiture very sparse and fine, white intermixed with ochreous, that on the prothorax wholly ochreous. Head sulcate between the eyes; rostrum shining, stout, arcuate, very sparsely, minutely punctate; joint 2 of the funiculus shorter than 1. Prothorax rather convex, broader than long, constricted and much narrowed in front, the sides parallel at the base; densely, confluent punctate. Elytra moderately long, subtriangular, transversely depressed on the disc below the base; finely punctate-striate, the interstices rugulose, the alternate ones strongly, interruptedly costate, 2, 4, and 6 also sharply costate on the apical declivity. Ventral segments rather closely punctate.

Length $3\frac{1}{4}$ –4, breadth $1\frac{1}{2}$ – $1\frac{5}{8}$ millim. (♀?)

Hab. MEXICO (*Höge, in coll. Solari*); GUATEMALA, Zapote (*Champion*).

Two specimens. Near *P. opacus*, the prothorax more rounded at the sides, the elytra sharply ochreo-fasciate on the disc beyond the middle, transversely depressed below the base, and with all the interstices interruptedly costate, the short ridge near the base of the third very prominent. *P. costatus* has the facies of a *Conotrachelus*.

15. *Peridinetus stigmatipleura*, sp. n. (Tab. X. fig. 28.)

Oblong, piceous or brown, the antennæ, tibiæ, and tarsi, the base of the femora, and sometimes the head and rostrum also, ferruginous or reddish; somewhat sparsely clothed with very fine, hair-like, ochreous scales, the prothorax with a denser, posteriorly evanescent, ochreous vitta on each side, the vittæ with intermixed coarser white scales towards the anterior margin; the elytra each with two chalky-white spots on the fourth interstice—one before and one beyond the middle (the posterior one often larger and extending inwards across the third interstice, the anterior one sometimes wanting)—and a large dense chalky-white patch at the sides below the shoulder, this latter extending downward on to the sides of the metasternum; the vestiture of the abdomen very sparse and whitish, becoming denser along the sides. Rostrum very stout, arcuate, cylindrical, a little longer than the prothorax, finely, shallowly, very sparsely punctate in the ♂, smoother in the ♀. Prothorax transversely rounded at the sides anteriorly, constricted and narrowed in front; finely, rugulosely punctate. Elytra wider than the prothorax, oblong-subtriangular; finely punctate-striate, the interstices rugulose, becoming narrowly costate at the apex. Ventral segments very sparsely punctate, unimpressed.

Length 3 – $4\frac{1}{10}$, breadth $1\frac{1}{3}$ – $1\frac{5}{8}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Numerous specimens. This species has a large, transverse, dense, chalky-white patch at the sides of the body beneath and two small white spots on the fourth interstice of each elytron. The ochreous vittæ on the prothorax sometimes have intermixed white scales towards the apex. The sexual differences are slight, if I have rightly identified the male and female.

16. *Peridinetus quadrimaculatus*, sp. n. (Tab. X. figg. 29, 29 a, ♂.)

Elongate, opaque above, rufo-piceous, the antennæ (the club excepted) and legs ferruginous; somewhat thickly clothed with very minute, hair-like, fulvous scales (which are partly hidden by a similarly-coloured exuda-

tion), the elytra each with two velvety-black spots—one, oblique, rather large, at the middle of the disc, the other small, on the subapical callosity; the vestiture of the under surface sparser, the abdomen with the sides only squamose. Rostrum very stout, curved, scarcely longer than the prothorax, rugulosely punctate and subcarinate, the antennæ inserted near the tip, joints 3-7 of the funiculus very short, together barely so long as the club. Prothorax as long as broad, conical, feebly constricted towards the apex, minutely punctate. Elytra one-half wider than the prothorax, elongate-triangular, depressed on the anterior portion of the disc, the subapical callosities tuberculiform; with rows of shallow punctures placed in fine striæ, the interstices alutaceous. Ventral segments shining and almost smooth (the sides excepted), 1 and 2 slightly pilose down the middle, 5 with a broad deep excavation, which has a small tuft of hair on each side at the tip. Legs long, rather slender; the tibiæ each with a long spur, the posterior pair strongly bisinuate.

Length 5, breadth 2 millim. (♂.)

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*).

One example, in rather dirty condition. This insect might be mistaken for a small *Hilipus*, but it may be easily separated from that genus by the ascending epimera of the mesothorax, the sulcate prosternum, &c.

PERIDINETELLUS, gen. nov.

Rostrum stout, curved, about as long as the prothorax, the scrobes oblique, lateral, visible from the side, the antennæ inserted near the middle; eyes large, distant; prothorax subcylindrical, convex, bisinuate at the base, compressed at the sides of the disc posteriorly; scutellum strongly transverse, subquadrate; elytra oblong, one-half wider than the prothorax; pygidium not visible; prosternum deeply sulcate; anterior coxæ narrowly separated; meso- and metasternum flattened and depressed between the middle coxæ; ventral sutures 2-4 deep; mesothoracic epimera ascending, large; femora sharply dentate; tibiæ sharply unguiculate; tarsi with joint 3 bilobed, the claws small and completely connate; body convex, in great part glabrous.

This genus includes a single species, which in its general facies is very like a small *Otidoccephalus*. Following Lacordaire's arrangement, it belongs to the Peridinetides. The subcylindrical, posteriorly compressed, smooth prothorax, almost glabrous body, &c., distinguish the present genus from *Peridinetus*.

1. *Peridinetellus subnudus*, sp. n. (Tab. XI. figg. 4, 4 a.)

Oblong-oval, very shining, glossy black; the prothorax and elytra with a narrow, common, transverse, curved fascia of pure white, hair-like scales at the base, the sides of the body beneath also with a narrow band of similar scales—dense on the metathoracic episterna and extending forward along the propleura,—the base of the rostrum and the legs with scattered white scales. Head sparsely, minutely punctate, broadly and deeply sulcate between the eyes; rostrum sparsely, finely punctate, smooth along the middle at the base. Prothorax as long as broad, scarcely narrowed in front, almost smooth, with a deep longitudinal furrow on the posterior portions of the flanks. Elytra somewhat triangular, the humeri obtuse but prominent; very faintly striate, the striæ deeper at the sides and with fine, scattered, oblong, shallow punctures, these becoming deeper towards the base and suture. Beneath almost smooth. Tibiæ and tarsi slender.

Length $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♀?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen.

Sect. PANTOTELIDES.

Pantotélides, Lacordaire.

Two American genera have been referred to the Pantotelides: *Pantoteles*, Schönh., and *Cyrionyx*, Faust; this latter has descending scrobes, and is therefore best placed elsewhere.

PANTOTELES.

Pantoteles, Schönherr, Gen. Curc. viii. 2, p. 59 (1845); Lacordaire, Gen. Col. vii. p. 213.

The few described species of this genus are all from Tropical America. Seven are now recorded from within our limits, one of them (*P. albocinctus*) perhaps not really belonging to it. Its chief characters are the laterally placed, non-descending scrobes, the slender rostrum, the sulcate prosternum, the non-contiguous anterior coxæ, the toothed femora, and the narrowly separated tarsal claws. The males of some of the species have the anterior tarsi clothed with long projecting hairs, as in various Cryptorrhynchids.

Rostrum slender, straight or feebly curved, depressed at the base; prosternum sulcate, the anterior coxæ well separated.

Tarsal joints 1 and 2 narrow, the claws well-developed.

Prothorax infuscate on the disc, whitish or ochraceous at the sides and apex; elytra mottled with white *hirtimanus*, sp. n.

Prothorax with two broad vittæ, and the elytra with a broad sub-apical fascia, extending down the suture to the tip, ochreous . . . *flavofasciatus*, sp. n.

Prothorax with a median vitta, and the elytra with a narrow transverse post-median fascia, black, the rest of the vestiture of the upper surface flavo-cinereous *longimanus*, sp. n.

Prothorax and elytra mottled with flavo-cinereous or ochreous, the prothorax usually with a pale median vitta.

Elytra oblong *tenuirostris*, Boh.

Elytra shorter, subtriangular *marmoratus*, sp. n.

Tarsal joints 1 and 2 broader, the claws small; prothorax with sides and a narrow median line, and the elytra with the apical half, flavo-cinereous *dimidiatus*, sp. n.

Rostrum stouter, arcuate, not depressed at the base; prosternum very shallowly sulcate, the anterior coxæ separated by a narrow lamina only; prothorax with sides, and the elytra with a broad ante-median fascia and a common, heart-shaped, subapical patch, whitish *albocinctus*, sp. n.

1. *Pantoteles hirtimanus*, sp. n. (Tab. X. figg. 30, 30 a, ♂.)

Elongate, somewhat shining, nigre-piceous, the antennæ (the club excepted), rostrum, tibiæ, femora in part, and anterior margin of prothorax, more or less ferruginous; the vestiture fine and close above, denser, coarser, and wholly white beneath: the prothorax white (or ochraceous) at the sides and apex, brown

on the rest of the disc; the elytra brown, with scattered white spots, which are condensed into an irregular transverse fascia towards the apex, the fascia being connected at the sides with an elongate white lateral patch; the head white or pale ochraceous. Head densely punctate, foveate between the eyes; rostrum almost straight, much longer than the head and prothorax, slender, depressed at the base, finely punctate-strigate in the ♂, almost smooth in the ♀, the antennæ inserted at the middle in the ♂, and nearer the base in the ♀, joints 1 and 2 of the funiculus elongate, 1 longer than 2. Prothorax subconical, nearly as long as broad, constricted in front; densely, minutely punctate, and finely carinate. Elytra long, much wider than the prothorax, very gradually narrowing from the base; finely punctate-striate, the interstices flat and densely punctulate. Ventral segment 1 broadly, and 5 shallowly, depressed down the middle in the ♂. Legs rather elongate (the anterior pair especially); anterior tibiae ciliate within and slightly curved at the apex, and the anterior tarsi set on each side with numerous long projecting hairs, in the ♂.

Length 7, breadth $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. COSTA RICA, Azahar de Cartago (*Underwood*).

One pair, varying in the colour and arrangement of the markings of the upper surface, the male having the white portions of the head and prothorax ochraceous and fewer white spots on the elytra. This insect is very like *Peridinetus irroratus* and its allies, but the rostrum and male tarsal characters are those of a true *Pantoteles*.

2. *Pantoteles flavofasciatus*, sp. n. (Tab. X. fig. 31, ♀.)

Oblong, flattened above, opaque, nigro-piceous, the apical half of the rostrum ferruginous; the vestiture fine: the head, the prothorax with a broad vitta on each side, and the elytra each with an oblique subapical fascia, extending broadly down the suture to the tip (almost enclosing a large, rounded, lateral spot), and various small scattered patches along the striæ, ochraceous, the entire under surface whitish, the rest of the upper surface fuscous. Head densely punctate, sulcate between the eyes; rostrum slender, a little longer than the head and prothorax, feebly curved, depressed at the base, almost smooth. Prothorax broader than long, conical, slightly constricted in front, the sides rounded at the base; densely, very finely punctate. Elytra much broader than the prothorax, elongate-subtriangular, the humeri rather prominent; finely punctate-striate, the interstices flat, densely punctulate, 4-9 feebly costate towards the apex. Legs long and slender.

Length $5\frac{1}{2}$, breadth $2\frac{2}{5}$ millim. (♀.)

Hab. COSTA RICA, Azahar de Cartago (*Underwood*).

One specimen. Smaller than *P. hirtimanus*, the rostrum shorter, the prothorax more transverse and broadly flavo-bivittate, the elytra each with a broad, oblique, subapical, ochraceous fascia extending down the suture to the tip and various small clusters of similarly-coloured scales along the striæ.

3. *Pantoteles longimanus*, sp. n. (Tab. X. fig. 32, ♂.)

Elongate-elliptic, somewhat flattened above, opaque, black, the antennæ and legs piceous, the apex of the rostrum rufescent; the vestiture close, above and beneath, yellowish-cinereous, the prothorax with a broad, anteriorly evanescent, median vitta, and the elytra with a narrow transverse fascia beyond the middle and a spot on the subapical callosity, black. Head densely, finely punctate, sulcate between the eyes; rostrum almost straight, about as long as the head and prothorax, slender, depressed at the base, finely, rugulose punctate and subcarinate to about the middle, the apical portion smoother. Prothorax broader than long, constricted in front, the sides rounded and rapidly converging from near the base, the

hind angles obtuse; densely, very finely punctate. Elytra much wider than the prothorax, gradually narrowing from the base; finely punctate-striate, the interstices flat, densely punctulate. Ventral segments 1 and 2 broadly depressed down the middle. Legs rather slender, the anterior pair elongate; anterior tibiae sparsely ciliate within from about the middle to the apex; anterior tarsi clothed on each side with numerous long projecting hairs.

Length $5\frac{1}{2}$, breadth $2\frac{1}{4}$ – $2\frac{2}{5}$ millim. (♂.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

Two males. The black median vitta of the prothorax, the narrow, transverse, sharply-defined, black, post-median fascia of the elytra, the elongate-elliptic general shape, and the long anterior legs and the very hairy front tarsi of the male readily distinguish *P. longimanus*.

4. *Pantoteles tenuirostris*. (Tab. X. figg. 33, 33 *a*, ♂.)

Pantoteles tenuirostris, Boh. in Schönh. Gen. Curc. viii. 2, p. 61¹; Chevr. Bull. Soc. Ent. Fr. 1879, p. clxiii².

Pantoteles glabrirostris, Chevr. in litt.³

Hab. MEXICO², Playa Vicente and Toxpam in Vera Cruz (*Sallé*); GUATEMALA, Teleman and San Juan in Vera Paz (*Champion*); PANAMA, Bugaba (*Champion*).—BRAZIL^{1 2}.

Numerous specimens. The markings of the upper surface are variable, according to the greater or less predominance of the fuscous scales, the prothorax sometimes having a large dark patch on the disc at the base and the pallid median line indistinct. The female has a longer and smoother rostrum than the male. In the last-mentioned sex the first two ventral segments are depressed down the middle and the anterior tarsi are clothed with long, fine, projecting hairs. *P. tenuirostris* seems to be distributed in collections under the MS. name *P. glabrirostris*, Chevr.

5. *Pantoteles marmoratus*, sp. n. (Tab. XI. figg. 1, 1 *a*, ♀.)

Oblong-ovate, dull, piceous, the rostrum ferruginous, the tarsi black; mottled above with small pale ochreous and fuscous scales (the vestiture of the prothorax apparently a little denser along the middle and at the sides, and that of the elytra showing a tendency to form a median and a subapical fascia); the under surface uniformly clothed with pallid scales. Head densely, finely punctate, sulcate between the eyes; rostrum straight, slender, about as long as the prothorax, depressed and sparsely punctate at the base. Prothorax transversely rounded at the sides anteriorly, constricted and much narrowed in front; densely, finely punctate and obsoletely earinate. Elytra moderately long, much wider than the prothorax, subtriangular, the humeri rather prominent; finely punctate-striate, the interstices flat, densely punctulate.

Length $4\frac{1}{2}$, breadth $2\frac{2}{5}$ millim. (♀.)

Hab. PANAMA, Caldera in Chiriqui (*Champion*).

One specimen. Less elongate than *P. tenuirostris*, the elytra shorter, more triangular, and relatively wider at the base. The vestiture is similarly coloured in the two forms.

6. *Pantoteles dimidiatus*, sp. n. (Tab. XI. fig. 2*, ♂.)

Oblong-ovate, opaque, nigro-piceous, the antennæ (the club excepted) ferruginous; the head, the prothorax with the sides, flanks, and a faint median line, the apical half of the elytra, the meso- and metasternum (except at the sides), and the ventral surface, thickly clothed with small flavo-cinereous scales; the rest of the upper and under surfaces sparsely set with brownish scales, appearing almost bare. Head densely, finely punctate, sulcate between the eyes; rostrum almost straight, slender, a little longer than the prothorax, depressed at the base, sparsely finely punctate. Prothorax transverse, rather convex, constricted and much narrowed in front; densely, finely punctate. Elytra moderately long, a little wider than the prothorax, gradually narrowing from the base, the humeri somewhat swollen; finely punctate-striate, the interstices flat, densely punctulate. Ventral segments 1 and 2 depressed down the middle. Legs comparatively short and stout; tarsi rather broad, the anterior pair with a few projecting hairs, the claws small.

Length $5\frac{1}{2}$, breadth $2\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen, perhaps a little worn. Less elongate than *P. tenuirostris*, the apical half of the elytra densely, uniformly squamose (the scales coarser, a few of them extending forward along the edges of the striæ), the legs shorter and stouter, the tarsal claws smaller. *Ambates posticus*, Kirsch, from Colombia, has the vestiture of the elytra somewhat similarly coloured.

7. *Pantoteles albocinctus*, sp. n. (Tab. XI. figg. 3, 3a, ♂.)

Elongate-elliptic, dull, black; the prothorax with the sides broadly, the elytra with a very broad, common, transverse fascia below the base (extending downward on to the metasternum) and a large, common, somewhat heart-shaped, patch on the disc towards the apex, and the under surface (the mesothoracic side-pieces, a broad space at the sides of ventral segment 1, and a narrow space along the middle of segments 3-5, excepted), densely clothed with rather coarse whitish scales, the rest of the vestiture of the elytra sparser, blackish, the median third of the prothorax and the head and rostrum almost bare. Rostrum feebly arcuate, moderately stout, flattened at the tip, sparsely punctate at the base, and almost smooth thence to the apex, the scrobes lateral. Joint 1 of the funiculus longer than 2. Prothorax broader than long, rapidly narrowing from the base, the sides somewhat rounded; densely, finely, confluent punctate, with indications of a smooth median line. Elytra much wider than the prothorax, elongate-triangular; finely punctate-striate, the interstices rugulose. Prosternum feebly sulcate. Anterior coxæ separated by a narrow lamella only. Ventral segment 1 depressed in the centre posteriorly, 3 and 4 with a narrow smooth space down the middle, and 5 shallowly foveate at the apex.

Length $7\frac{4}{5}$, breadth $3\frac{1}{5}$ millim. (♂.)

Hab. COSTA RICA, Caché (*Rogers*).

One specimen, somewhat badly preserved. The broad, transverse, whitish fascia on the elytra is in this species continued round the metasternum, a common, large, heart-shaped patch on the disc towards the apex and the sides of the prothorax being also whitish. The elongate-elliptic shape, and the very narrowly separated anterior coxæ, also help to distinguish *P. albocinctus*. The rostrum is stouter and more curved than in the other species here referred to *Pantoteles*.

* The insect is more elongate than represented by our artist on the Plate.

Sect. OPTATIDES.

This section is here used provisionally to include the Tropical-American genera *Optatus*, *Telemus*, *Pardisomus*, *Eurypages*, *Sympages*, and *Lydamis*, of Pascoe, *Macroptatus*, Heller, and *Cyrionyx*, Faust, all of which seem to me to be best removed from the "Centrinides" of Lacordaire, and placed near the "Pantotelides." They have the mandibles toothed on their inner edge; the anterior coxæ contiguous or narrowly separated (except in such broad forms as *Macroptatus* and *Eurypages*); the prosternum unarmed in the male, not raised between the coxæ, and with the ante-coxal portion usually more or less sulcate down the middle; the scutellum well-developed (except in *Pseudoptatus*); the elytra broad and subtriangular, sometimes with laterally projecting humeri; the femora sharply dentate or denticulate; the tibiæ rarely bidentate externally (*Pseudoptatus*); the males in certain genera with the tibiæ ciliate (*Pardisomus*) or the anterior tarsi greatly dilated and hairy (*Optatus*, *Telemus*, *Eurypages*, and *Macroptatus*); the body rhomboidal or subovate, more or less squamose.

Various other "Centrinides" belong here, as *Scambus galeatus*, Boh., &c.

OPTATUS.

Optatus, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 322, 327 (1889).

Three species of *Optatus* are enumerated from within our limits, all from Mexico or Guatemala. Its chief characters are, the contiguous anterior coxæ, the unarmed prosternum, with rather broad, shallow, or deep median sulcus, the bidentate mandibles, the long, curved rostrum, the sharply dentate, feebly clavate femora, the greatly dilated anterior tarsi of the male, and the connate tarsal claws. The general shape is broad and rhomboidal, and the vestiture is close or fasciculate.

1. *Optatus palmaris*. (Tab. XI. figg. 5, 5 a, ♂.)

♂. *Centrinus palmaris*, Pasc. Ann. & Mag. Nat. Hist. (6) iv. p. 326¹.

Centrinus miniatus, Chevr. in litt.².

Hab. MEXICO¹ (*Truqui*, coll. *Fry*), Cuernavaca (*Sallé*), Tehuantepec (*Mus. Brit.*).

We have received one male and two females of this species and there are various others in the British Museum. It is readily recognizable by the vermilion-red, oblique, submarginal stripe on each side of the prothorax, which extends downward on to the flanks at the base and apex, each stripe being bordered within and without by two large bare black spots; the mesosternal side-pieces, the metathoracic episterna (except in front), and the sides of the abdomen are also thickly clothed with vermilion-red scales. The first two ventral segments are broadly excavate down the middle in the male. The prosternal sulcus is rather deep and limited on each side by a sharp ridge. The red scales are of a paler tint in some specimens.

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2. *Optatus inornatus*, sp. n.

Oblong-rhomboidal, black; above rather sparsely, beneath densely, clothed with minute fulvous scales. Head rugulosely punctate; rostrum closely punctate, laterally sulcate in its basal half. Prothorax transverse, conical, constricted in front, somewhat convex; densely, finely, confluent punctate, the narrow interspaces obliquely raised, and with a smooth, raised, median line. Elytra finely punctate-striate, the interstices transversely rugose and almost flat. Beneath closely punctate; ventral segments 1 and 2 broadly excavate down the middle; prosternal sulcus shallow, the lateral carinae not prominent. Femora acutely dentate. Tibiae more or less sinuous. Anterior tarsi clothed with long, projecting hairs, joints 2 and 3 very broadly, and 1 moderately, dilated.

Length 8, breadth $4\frac{1}{2}$ millim. (σ .)

Hab. GUATEMALA (*Sallé*).

One male, partially abraded above. This is the Guatemalan representative of the Mexican *O. palmaris*: the red markings are entirely wanting, above and beneath; the prosternal sulcus is shallower; the tibiae are more sinuate; and the first joint of the anterior tarsi is less dilated. The prothorax is obliquely strigose and the elytral interstices transversely rugose.

3. *Optatus fasciculosus*, sp. n. (Tab. XI. figg. 6, 6 a, σ .)

Rhomboidal, shining, black or piceous; the depressions of the surface, above and beneath, set with small fascicles of narrow, adpressed, ochreous or whitish scales, the legs also clothed with similar scales. Head rugulosely punctate, shallowly foveate between the eyes; rostrum closely punctate and laterally sulcate, smoother in the φ . Prothorax transversely conical, constricted in front; coarsely, obliquely strigose—the raised interspaces smooth and irregular, the depressions confluent punctate,—and with a smooth median ridge. Elytra deeply punctate-striate, the interstices more or less convex, vermiculate—the depressions transverse and here and there confluent, the raised portions smooth and bare. Beneath closely punctate; prosternal sulcus shallow; ventral segments 1 and 2 broadly excavate down the middle in the σ . Femora sharply dentate.

σ . Rostrum with a small tubercle in the centre at the apex beneath. Anterior tarsi with joints 1–3 very broadly dilated and set with long, projecting hairs.

Length $5\frac{1}{2}$ – $8\frac{1}{2}$, breadth $3\frac{1}{10}$ –5 millim. (σ φ .)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*), Cerro de Plumas (*Höge*); GUATEMALA, Zapote (*Champion*); COSTA RICA (*coll. Solari*), Santa Clara, San José, and San Carlos (*Biolley*).

The vermiculate sculpture, the fasciculate arrangement of the scales, and the tuberculate apex of the rostrum of the male readily separate *O. fasciculosus* from its allies. It is found on *Anonis squamosa*, according to Prof. Biolley, to whom we are indebted for four specimens.

MACROPTATUS.

Macroptatus, Heller, Stett. ent. Zeit. 1906, pp. 46, 47.

This genus is based upon a remarkable insect from Costa Rica, one of the finest Barids known as yet, of broad, rhomboidal form, flattened above, with the metasternum strongly protuberant in front, the prosternum unarmed and with a narrow median

suleus, the anterior coxæ well-separated, the mandibles emarginate within (bidentate when viewed from the side), the rostrum long, curved, and crenulate beneath, the femora clavate and sharply dentate, the anterior tarsi greatly dilated, the tarsal claws connate at the base. The type, kindly communicated by Dr. Heller, is doubtless of the male sex, it having the first ventral segment excavate down the middle.

1. **Macroptatus championi.** (Tab. XI. figg. 7, 7 a.)

Macroptatus championi, Heller, Stett. ent. Zeit. 1906, p. 48¹.

Hab. COSTA RICA, Turrialba (*Mus. Dresden*¹).

PSEUDOPTATUS, gen. nov.

Head convex, small; eyes rather small and depressed. Mandibles short, blunt at the tip, toothed on their inner edge; rostrum arcuate, longer than the head and prothorax, stout, tapering outwards in the ♀, the scrobes rapidly descending, the antennæ inserted at (♂) or behind (♀) the middle, joints 2-7 of the funiculus gradually widening, 1 nearly twice as long as 2, the club stout and ovate; prothorax transversely convex, bisinuate at the base and apex, the anterior portion short, narrow, and tubulate, with well-developed ocular lobes; scutellum small, hidden by narrow scales; elytra broad, triangular; pygidium not visible; prosternum unarmed in the ♂, declivous in front, with a narrow median sulcus, depressed between the coxæ; metathoracic episterna very broad; anterior coxæ very narrowly, the others widely, separated; femora gradually widening outwards, abruptly excavate near the apex, shallowly sulcate beneath and armed with two or three minute teeth; tibiæ strongly and acutely dilated on the outer edge near the base and at the apex; anterior tarsi similar in the two sexes; tarsal claws connate at the base; body convex, rhomboidal, rugose, clothed with minute, scattered, hair-like scales.

This genus includes a single species from Mexico, and is easily recognizable by the exteriorly bidentate tibiæ. It is nearly related to *Optatus*. The sexual characters of the male are very peculiar.

1. **Pseudoptatus dentipes**, sp. n. (Tab. XI. figg. 8, 8 a, b, ♂.)

Robust, opaque, black, the antennæ, rostrum, and legs in great part ferruginous; the vestiture fulvous, very sparse, the scutellar cavity with a dense cluster of coarser, hair-like, ochreous scales; the entire surface, the legs and rostrum included, coarsely, densely punctate. Prothorax with the sides rounded and rapidly converging from the base to the anterior lobe. Elytra with densely-packed rows of coarse oblong punctures separated by narrow raised lines, the striæ faint and only visible when the insect is viewed from the side. Legs rather stout, moderately long, the posterior femora about reaching the apex of the abdomen.

♂. Rostrum tuberculate on each side at the apex beneath, rugose to the tip; metasternum and first ventral segment very broadly depressed down the middle, the second segment with a line of dense, erect, curled, ochreous hairs extending across the median third before the middle.

♀. Rostrum unarmed, not so stout, the apical half more slender and sparsely punctate.

Length 5-5½, breadth 3½ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca (*Sallé*), Chilpancingo (*H. H. Smith*).

Three specimens—two males and one female.

LYDAMIS.

Lydamis, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 322, 323 (1889).

Mandibles toothed on their inner edge; eyes moderately large, depressed; rostrum strongly areuate, longer than the head and prothorax, the scrobes descending, the antennæ inserted at about the middle in both sexes, joints 1 and 2 of the funiculus nearly equal in length, the club acuminate-ovate; prothorax somewhat conical, without ocular lobes, deeply bisinuate at the base, the median lobe broad and subtruncate; scutellum short and broad; elytra broad and triangular; pygidium not visible; prosternum unarmed in the ♂, depressed between the coxæ, the median sulcus broad; anterior coxæ subcontiguous, the others more or less widely separated; femora strongly clavate and sharply dentate; tibiæ strongly unguiculate; anterior tarsi similar in the two sexes; tarsal claws long, free; body rhomboidal, thickly clothed with hair-like or narrow scales.

Type, *Centrinus angulus*, Boh.

Centrinus angulus, Boh., from Brazil (Pará, Santarem, &c.), and its closely-allied Mexican representative, *C. cinnamomeus*, are nearly related to *Optatus*, differing from that genus in the strongly clavate femora, the simple anterior tarsi of the male, and the long, divergent claws.

1. *Lydamis cinnamomeus*, sp. n. (Tab. XI. figg. 9, 9 a, ♂.)

Convex, somewhat shining, black, the antennæ and the apices of the tarsi obscure ferruginous; the vestiture close, fine, and hair-like, fulvous or rust-red, that of the elytra in great part fuscous or black, a few small white scattered spots excepted (these sometimes condensed into a narrow oblique streak on the disc towards the apex), the prothorax with a faint white streak along the flanks and the under surface with a few intermixed whitish scales. Rostrum rather stout, rugosely punctate and carinate, the apical half closely (♂) or sparsely (♀) punctate. Prothorax broader than long, rapidly narrowing from the base, slightly compressed at the sides before the apex; densely, finely punctate and feebly carinate. Elytra punctate-striate, the interstices densely punctulate, flat on the disc, feebly convex at the sides, 7 and 8 with a faint raised line. Beneath closely punctate; metasternum and first two ventral segments broadly excavate down the middle in the ♂.

Length $5\frac{1}{2}$ – $6\frac{2}{3}$, breadth $3\frac{1}{10}$ –4 millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente and Toxpam in Vera Cruz (*Sallé*).

Four specimens, one of which is immature. Very near *L. angulus*, Boh., but with the vestiture finer and more scattered (above and beneath); the surface less densely punctulate and more shining; the prothorax not so convex on the middle of the disc; the elytra less flattened on the disc posteriorly.

CYRIONYX.

Cyrionyx, Faust, Stett. ent. Zeit. 1896, p. 97.

Numerous species are placed under this genus, which was referred by Faust to the "Pantotelides." *Centrinus scapulosus*, Boh., and the larger forms approach *Optatus* and *Telemus*, and one, *C. camelus*, is very like *Scambus galeatus*, Boh.*; the smaller forms are closely related to the Venezuelan *C. biplayiatus*, Faust (the type of which, a ♂, I have examined). As there is a gradual transition in these insects from one to

* Lacordaire (Gen. Col. vii. p. 232, nota) has already called attention to the characters of this species.

the other, and no particular value can be placed on the amount of development of the prosternal sulcus, the sinuation of the base of the prothorax, and the contiguity or separation of the tarsal claws, they are here all placed under *Cyrionyx*. The following are their essential characters:—

Mandibles toothed within; rostrum arcuate, as long as, or longer than, the head and prothorax, with obliquely descending scrobes; prothorax bisinuate or subtruncate at the base, without ocular lobes; scutellum subtriangular or trapezoidal; elytra much wider than the prothorax, subtriangular; prosternum unarmed in ♂, the median sulcus (deep, shallow, or almost wanting) limited posteriorly by the contiguous or narrowly separated anterior coxæ, the other coxæ distant; femora each with an acute tooth, feebly clavate; anterior tarsi similarly formed in the two sexes; tarsal claws free or subconnate; body more or less clothed with narrow scales.

Thus defined, *Cyrionyx* (in its extended sense) may be separated from *Optatus*, *Telemus**, and *Eurypages*, all of which have the anterior tarsi greatly dilated and hairy in the males, *Telemus*, moreover, having the femora clavate, as in *Lydamis*. Some of the species might easily be mistaken for *Conotracheli*.

- a. Prosternal sulcus deep; prothorax (except in *C. cavirostris*) more or less sinuate at the base.
 - a¹. Elytra with the alternate interstices completely or interruptedly costate.
 - a². Humeri prominent or subangularly dilated; anterior coxæ contiguous or subcontiguous.
 - a³. Tarsal claws divergent Species 1.
 - b³. Tarsal claws contiguous at the base.
 - a⁴. Third and fifth elytral interstices interruptedly costate and each with a hump-like elevation below the base; rostrum comparatively short Species 2.
 - b⁴. Third and fifth elytral interstices uninterruptedly costate, the third only with a hump below the base; rostrum very long and slender Species 3.
 - c⁴. The alternate interstices simply eostate Species 4, 5.
 - b². Humeri not prominent; anterior coxæ well-separated; tarsal claws free.
 - c³. Prothorax without prominence on the disc Species 6.
 - d³. Prothorax with a large prominence at middle of disc Species 7.
 - b¹. Elytra and prothorax with large setigerous prominences on the disc, the median one on the third elytral interstice long and acutely produced posteriorly, the humeri sharp; anterior coxæ well separated; tarsal claws divergent Species 8.
 - c¹. Elytra and prothorax with smaller prominences on the disc, the humeri obtuse; anterior tarsi contiguous; tarsal claws contiguous at base Species 9.
 - d¹. Elytra faintly eostate down the middle of each interstice.
 - c². Rostrum long, not sulcate beneath; tarsal claws contiguous at base Species 10.

* The type of this genus, *Centrinus cestrotus*, Boh., has the femora strongly dentate, not "mutic," as stated by Pascoe.

- d*². Rostrum short and stout, sulcate and thickened at the middle beneath ;
tarsal claws free Species 11.
- e*¹. Elytra with interstices 7 and 9 narrowly costate; prothorax with a
setigerous hump; tarsal claws free Species 12.
- f*¹. Elytra with interstices 3, 7, and 9 narrowly costate near the base, the
humeri swollen; prothorax conical; tarsal claws free Species 13.
- g*¹. Elytra with interstices 7 and 9 faintly costate, the others flat, the humeri
subangularly dilated; tarsal claws contiguous at base Species 14.
- h*¹. Elytra with the interstices flat or feebly convex, the humeri obtuse;
tarsal claws contiguous at base Species 15-18.
- b*. Prosternal sulcus shallow or wanting; prothorax very feebly sinuate at the
base; anterior coxæ contiguous; tarsal claws very small, free or sub-
connate at base: species small, more or less variegate or maculate with
ochreous, whitish, or pure white scales. [CYRIONYX, Faust.]
- i*¹. Elytra with the interstices very sharply costate from near the base, the
humeri rather prominent Species 19, 20.
- j*¹. Elytra with the inner interstices moderately costate from near the base Species 21.
- k*¹. Elytra elongate-triangular, with the dorsal interstices smooth and flat Species 22.
- l*¹. Elytra shorter, with the interstices flat or convex, closely punctulate or
rugulose.
- e*². Prothorax and elytra with patches or lines of coarser, ochreous or
white scales Species 23-31.
- f*². Prothorax and elytra mottled with a dense clothing of light and dark
scales, the scales on the elytra oval Species 32-34.

1. *Cyrionyx decemcostatus*, sp. n. (Tab. XI. figg. 10, 10 *a*.)

Subrhomboidal, nigro-piceous or black, the antennæ, rostrum, tibiæ, and tarsi reddish or ferruginous; variegated with a rather dense clothing of small, narrow, fulvous (or ochreous) and white scales, the white scales on the prothorax clustered into a narrow curved stripe on each side of the disc and those on the elytra into small scattered spots, which are here and there transversely confluent, the elytra also with a black patch at about the middle of the disc and a transverse black fascia near the apex; the vestiture of the under surface and legs sparse, fulvous and white intermixed. Rostrum stout, strongly arcuate, about as long as the head and prothorax, thickly punctate, a little smoother in the ♀, the antennæ inserted beyond the middle. Prothorax transverse, somewhat gibbous, rounded at the sides anteriorly, constricted and much narrowed in front, the short anterior portion tubulate; densely, finely punctate, and also carinate. Elytra broad at the base, triangular, with obtuse, projecting humeri; punctate-striate, the punctures oblong in shape, the interstices densely rugulose, 2, 3, 5, 7, and 9 sharply costate, the ridges on 2, 3, and 5 more or less interrupted and not reaching the base. Beneath rather sparsely punctate; presternum sulcate; ventral segment 1 broadly depressed down the middle in the ♂. Femora each with a small tooth. Tarsal claws long, free.

Length $4\frac{1}{8}$ -5, breadth $2\frac{1}{2}$ - $2\frac{5}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

Five specimens. Of the same size as *C. octocostatus*, but with a much shorter and stouter rostrum, the prothorax somewhat gibbous (the median carina arcuate, when viewed in profile), the elytral costæ more numerous (those on the disc interrupted), the humeri more prominent, the femora feebly dentate, the tarsal claws free.

2. *Cyrionyx conotracheloides*, sp. n. (Tab. XII. fig. 1.)

Subrhomboidal, robust, black, variegated above and beneath with a dense clothing of brown and whitish scales, the latter condensed into irregular sinuous lines at the sides of the prothorax, and numerous small spots on the elytra, the scales on the elytra oval in shape. Head densely, rugulosely punctate; rostrum slightly longer than the head and prothorax, arcuate, rather slender, sparsely, very finely punctate, rugulose and sharply carinate at the base, the antennæ inserted at a little behind the middle, joint 2 of the funiculus shorter than 1. Prothorax strongly constricted in front, the sides parallel at the base and obliquely converging anteriorly, the base deeply bisinuate; densely, rugulosely punctate, sharply carinate down the anterior half. Scutellum rounded behind, small. Elytra triangular, very much wider than the prothorax; finely punctate-striate, the striæ sinuous below the base, the punctures oblong and distant one from another, the interstices densely rugulose, 3, 5, 7, and 9 sharply, interruptedly, undulato-costate, 6 also costate posteriorly, the elevation below the base of 3 swollen into a large, elongate hump, and that near the base of 5 and 7 also much raised. Beneath densely punctate: prosternum deeply and rather broadly sulcate, the anterior coxæ narrowly separated. Legs stout; femora moderately clavate, the anterior pair feebly, the others more strongly dentate; third tarsal joint broadly bilobed, the claws connate at the base.

Length $5\frac{2}{3}$, breadth $3\frac{1}{2}$ millim. (♂?)

Hab. MEXICO (*Höge*).

One specimen, in the collection of Signor A. Solari, of Genoa. The less convex, sharply carinate prothorax, the oblong, hump-like prominences on the third and fifth elytral interstices below the base, and the more feebly dentate anterior femora distinguish *C. conotracheloides* from *C. reticulatus*. The small scutellum and the less clavate femora separate both species from the genus *Telemus*, Pasc.*

3. *Cyrionyx scapulosus*. (Tab. XII. figg. 2, 2 a.)

* *Centrinus scapulosus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 239¹.

Hab. MEXICO (*ex Mus. Chevrolat*¹).

The type of this species (? ♀) has been communicated by Dr. Sjöstedt. It is a very close ally of *C. conotracheloides*, and differs as follows:—The rostrum is very long and slender; the second joint of the funiculus is much longer than the first; the ridge on the third and fifth elytral interstices is uninterrupted, the hump on the third is shorter, and that on the fifth is altogether wanting; and the tooth on the anterior femora is as sharp as that on the other femora. The two insects may prove to be the sexes of the same species, but this is not likely to be the case.

4. *Cyrionyx octocostatus*, sp. n. (Tab. XI. figg. 11, 11 a.)

Rhomboidal, dull, black; thickly clothed with small, narrow, fulvous scales, with a few ochreous and whitish scales intermixed, the ochreous scales on the prothorax clustered into a faint curved band on each side of the disc, the whitish scales on the elytra condensed into small spots along the striæ, the elytra with a large, common, triangular space on the basal half of the disc mottled with black (perhaps due to abrasion of the scales): the vestiture of the under surface ochreous and whitish, dense on the pro- and mesopleura, that of the femora ferruginous above. Head rugulosely punctate; rostrum nearly reaching the apex of

* The femora, as already noted, are dentate in this genus.

the metasternum, arcuate, rugulosely punctate and finely carinate, the apical half rather sparsely punctured, the antennæ inserted behind the middle, the club acuminate-ovate. Prothorax convex, transverse, conical, strongly constricted in front; densely, finely punctate and sharply carinate. Elytra triangular, rather long, broad at the base, the humeri prominent, obtuse; finely punctate-striate, the interstices densely rugulose, 3, 5, 7, and 9 sharply costate, the ridge on 3 extending to the apex. Beneath closely punctate. Prosternum narrowly sulcate. Legs rather stout; femora strongly dentate; tarsal claws subconnate at the base.

Length $4\frac{1}{8}$, breadth $2\frac{4}{5}$ millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. Smaller and less robust than *C. reticulatus*, the prothorax sharply carinate, the acute ridge on the third elytral interstice extending to the apex, the humeri less angular, the antennal club longer and more acuminate.

5. *Cyrionyx reticulatus*, sp. n. (Tab. XI. figg. 12, 12 a.)

Broad, rhomboidal, nigro-piceous, the antennæ (the club excepted) ferruginous; mottled above with a dense clothing of small fulvous and whitish scales, the prothorax with several bare dark spots on the disc, the elytra irregularly reticulate with black on the disc towards the middle; the vestiture of the under surface and legs also close, fulvous and whitish intermixed. Rostrum long, rather slender, strongly arcuate, striate-punctate and carinate at the base, and for the rest sparsely, finely punctate, the antennæ inserted behind the middle, joints 1 and 2 of the funiculus equal in length. Prothorax transverse, narrowing from the base, compressed on either side of the convex disc anteriorly, and abruptly narrowed and strongly constricted in front: densely, finely punctate, and feebly carinate. Elytra triangular, broad at the base, the humeri angularly dilated; finely punctate-striate, the interstices rugulose, 3, 7, and 9 very sharply (especially down the anterior half), and 4-6 feebly (except towards the base), costate, the ridge on 3 not reaching the apex. Beneath closely punctate; prosternum narrowly sulcate; ventral segments 1 and 2 slightly depressed down the middle. Legs stout, rather short; femora strongly dentate; tarsi with the third joint broadly bilobed, the claws contiguous at the base.

Length $5\frac{1}{2}$, breadth $3\frac{1}{2}$ millim. (♀?)

Hab. PANAMA, David (*Champion*).

One specimen. The strongly constricted prothorax, the very acute ridge on the anterior half of the third, seventh, and ninth elytral interstices, the angularly dilated humeri, the stout legs, and the close, mottled vestiture distinguish *C. reticulatus*. Larger and more robust than *C. octocostatus*, the scrobes rapidly descending and only in part visible from the side.

6. *Cyrionyx maculicollis*, sp. n. (Tab. XI. figg. 13, 13 a.)

Short ovate, convex, black, the antennæ and tibiæ obscure ferruginous; the elytra sparsely, the rest of the upper surface thickly, clothed with minute scales: the head ochreous, mottled with fulvous in front; the prothorax with a large spot on the disc at the base and a median line extending thence to the apex ochreous, for the rest fulvous intermixed with white; the elytra with the humeri in front and several small spots along the raised alternate interstices fulvous, the third and fifth also spotted with black; the vestiture of the legs fulvous, slightly intermixed with white. Rostrum strongly arcuate, stout, a little longer than the head and prothorax, rugulosely punctate, smoother at the tip, the antennæ inserted beyond the middle. Prothorax transverse, constricted and much narrowed in front; densely, finely punctate. Elytra broad, subtriangular; punctate-striate, the interstices punctulate, 3, 5, 7, and 9, and 8 at the base, sharply costate, the ridge on 3 and 5 interrupted anteriorly. Anterior coxæ well-

separated. Prosternum deeply sulcate. Legs rather short and stout; femora strongly dentate; tarsal claws small, free.

Length $2\frac{1}{2}$, breadth $1\frac{3}{5}$ millim. (σ ?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. A near ally of the Guatemalan *C. gibbicollis*; the head ochreous on the vertex; the prothorax with a large ochreous spot on the disc, the dorsal hump wanting; the elytra shorter, with the vestiture sparse and almost wholly concentrated into spots along the raised interstices; the legs not so stout.

7. *Cyrionyx gibbicollis*, sp. n. (Tab. XI. figg. 14, 14 α , σ .)

Subrhomboidal, convex, black, the antennæ, tibiæ, and tarsi more or less ferruginous; thickly clothed with small rust-red scales, with a few white scales intermixed (those on the elytra clustered into minute scattered spots), the elytral interstices 3 and 5 spotted with black below the base. Rostrum strongly arcuate, stout, about as long as the head and prothorax, rugulose punctate and carinate, sparsely punctured at the apex, the antennæ inserted at about the middle. Prothorax short, narrowing from the base, strongly constricted in front, gibbous at the middle of the disc; densely, finely punctate. Elytra broad at the base, triangular; finely punctate-striate, the interstices densely rugulose, 3, 5, 7, and 9, and 8 at the base, sharply costate, the ridge on 3 and 5 interrupted below the base. Anterior coxæ well-separated. Beneath closely punctate. Prosternum broadly sulcate. Legs rather stout; femora strongly dentate; tibiæ each with a slender uncus; tarsal claws small, free.

Length $2\frac{1}{5}$, breadth $1\frac{1}{5}$ millim. (σ .)

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*).

One specimen. Very like a *Conotrachelus*, but easily separated therefrom by the ascending mesothoracic epimera and the simple tarsal claws. The dorsal hump of the prothorax is arcuate, viewed from the side. *C. gibbicollis* is one of the few Central-American Barids with interruptedly costate alternate elytral interstices.

8. *Cyrionyx cristatus*, sp. n. (Tab. XI. figg. 15, 15 α , φ .)

Subovate, nigro-piceous, the antennæ, tibiæ, and tarsi obscure ferruginous; above densely, beneath more sparsely, clothed with small rust-red, ochreous, and white scales, the dorsal elevations of the prothorax and elytra with dense clusters of long, coarse, erect setæ: the white scales above and beneath condensed into small scattered spots, the head above, a broad space down the middle of the prothorax, and the space between the large dorsal elevations of the elytra ochreous, the rest of the vestiture rust-red, that of the legs rust-red intermixed with white, the femora each with a blackish bare patch. Head convex, depressed between the eyes, densely, finely punctate; rostrum arcuate, stout, not longer than the head and prothorax, sparsely punctate, rugulose and finely carinate at the base, the antennæ inserted at the middle. Prothorax transverse, abruptly narrowed and constricted in front, the sides parallel at the base, the short anterior portion tubulate; densely, finely punctate, the posterior lobe with two compressed setigerous prominences on the disc in front, the anterior lobe with four small clusters of long erect setæ. Elytra broad at the base, triangular, the humeri subangularly dilated; punctate-striate, the second and third striae sinuate, the interstices rugulose, 3, 5, and 7 with scattered setigerous prominences, 9 sub-costate, the median elevation on 3 very large, oblong, and produced into a sharp tooth behind. Anterior coxæ well separated. Beneath closely punctate. Femora sharply dentate. Tarsal claws long and divergent.

Length $3\frac{1}{5}$, breadth 2 millim. (φ .)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

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One specimen, in beautifully fresh condition. Distinguishable by the setigerous prominences on the prothorax and elytra, the one at the middle of the third interstice long, stout, and acutely produced behind. *C. cristatus* approaches *C. gibbicollis*. It has somewhat the facies of *Phacelobarus singularis* from Madagascar.

9. *Cyrionyx nigrosellatus*, sp. n. (Tab. XI. figg. 16, 16 a, ♂.)

Subovate, black, the legs in part and the antennæ ferruginous; variegated above with a dense clothing of small, fulvous, whitish and black scales, the whitish scales on the prothorax clustered into a median line and various oblique streaks at the sides and those on the elytra into a very large apical patch, the black ones on the elytra condensed into a common, transverse, interrupted, rhomboidal median patch and a spot on the third and fifth interstices about midway between it and the base; the under surface and legs with intermixed fulvous and white scales. Rostrum strongly arcuate, stout, not longer than the head and prothorax, striate-punctate, the antennæ inserted at the middle. Prothorax transverse, gradually narrowing from the base, strongly constricted in front; densely, finely punctate, binodose on the disc. Scutellum small, triangular. Elytra subtriangular, slightly sinuate at the sides; very finely punctate-striate, the interstices densely rugulose, 3 (strongly) and 5 (feebly) nodose and nigro-squamose at about the middle, 5 produced into a conical tubercle at its point of termination. Beneath closely punctate; intercoxal portion of the metasternum broad and somewhat depressed; ventral segments 1 and 2 depressed down the middle. Legs rather short; femora strongly dentate.

Length 3, breadth $1\frac{2}{3}$ millim. (♂.)

Hab. PANAMA, Los Remedios near the Pacific coast (*Champion*).

One specimen. This species has wholly the facies of a Cryptorrhynchid (*Conotrachelus*, &c.), and may be known by its binodose prothorax and tuberculate elytra. The elytral interstices are flat and densely clothed with whitish scales behind the black squamigerous elevations at the middle of the disc; the conical tubercle at the apex of the fifth is very prominent.

10. *Cyrionyx balaninoides*, sp. n. (Tab. XI. figg. 17, 17 a, ♀.)

Rhomboidal, robust, nigro-piceous, the rostrum reddish; somewhat thickly clothed with minute, narrow, fulvous scales, the under surface and legs with a few whitish scales intermixed. Rostrum feebly arcuate, long, rather slender, sparsely, finely punctate, striate-punctate and carinate at the base, the carina running upwards between the eyes, the scrobes in great part visible from the sides, the antennæ inserted far behind the middle, the club large, acuminate-ovate. Prothorax broader than long, rapidly, arcuately narrowing from the base, strongly constricted in front; densely, finely, confluent punctate and also carinate, the carina not reaching the base and prominent in front. Elytra broad at the base, triangular; finely punctate-striate, the interstices almost flat, densely rugulose, each very finely costate down the middle, the ridges becoming more distinct towards the sides and obsolete towards the suture. Beneath closely punctate. Legs rather stout; femora strongly dentate; tarsal claws subconnate.

Length $4\frac{1}{8}$, breadth $2\frac{3}{4}$ millim. (♀.)

Hab. PANAMA, Caldera in Chiriqui (*Champion*).

One specimen. This insect somewhat resembles *Optatus inornatus* (the vestiture being similar in the two species), but it is smaller and less elongate, the rostrum is more slender, the elytral interstices are faintly costate, the scutellum is less transverse, &c. The rostral carina extends upward and nearly meets the median ridge of the prothorax, and the scrobes are in great part visible from the sides.

11. *Cyrionyx cavirostris*, sp. n. (Tab. XI. figg. 18, 18 a, ♂.)

Rhomboidal, convex, dull, piceous; clothed with minute, narrow, intermixed brownish and flavo-cinereous scales, which are here and there clustered into small fascicles on the elytra, the elytra also with a narrow transverse streak of coarser white scales on each side below the shoulder; the vestiture of the under surface sparse, cinereous. Rostrum strongly arcuate, stout, a little longer than the head and prothorax, thickened and sulcate at the middle beneath, rugosely punctate, smoother at the tip, the antennæ inserted at about one-third from the apex. Prothorax transverse, rounded at the sides, moderately convex, constricted and much narrowed in front; densely, finely punctate and feebly carinate. Elytra broad at the base, triangular, rather long; punctate-striate, the punctures oblong in shape, the interstices densely rugulose, each very finely and narrowly costate down the middle, the ridges becoming obsolete towards the base and more distinct towards the sides. Beneath closely punctate; first ventral segment broadly depressed down the middle. Femora acutely dentate. Tarsal claws free.

Length $3\frac{1}{2}$, breadth 2 millim. (♂.)

Hab. MEXICO, Jalapa (*Höge*).

One specimen. An isolated form, with the median portion of the rostrum thickened and sulcate beneath, the elytra with a transverse white streak on each side below the shoulder, their interstices faintly costate down the middle.

12. *Cyrionyx camelus*, sp. n. (Tab. XI. figg. 19, 19 a.)

Subrhomboidal, opaque, black, the femora piceous, the antennæ, tibiæ, and tarsi more or less ferruginous; somewhat thickly clothed with minute fulvous, white, and black scales, the dorsal hump of the prothorax with a cluster of long, erect setæ: the prothorax with a triangular black patch on the disc behind, divided by a white or fulvous median line, the flanks sometimes with a streak of coarser pure white scales; the elytra (except across the base, which is almost bare) variegated with fulvous, black, and white, the black scales condensed into a transverse patch on the disc before the middle (which is limited externally by a pure white spot on the fourth interstice), one or two common curved fasciæ below it, and a transverse subapical band; the sides of the metasternum densely clothed with rather coarse pure white scales, the rest of the under surface and the legs with minute fulvous and white scales. Rostrum stout, strongly arcuate, sparsely punctate, the antennæ inserted at the middle. Prothorax transverse, narrowing from the base, abruptly constricted in front, the short anterior portion tubulate; densely, finely punctate, the posterior lobe with a large, angular, compressed, setigerous hump on the disc in front. Elytra triangular, flattened on the disc at the base; very finely punctate-striate, the interstices flat and minutely punctulate, 7 and 9 narrowly costate, 2 and 3 slightly swollen before the middle. Beneath closely punctate. Metasternum broad and flattened between the middle coxæ. Anterior coxæ narrowly separated. Femora each with a short acute tooth. Tarsal claws free.

Length $2\frac{1}{2}$ – $2\frac{3}{4}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim.

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Four specimens, one of them abraded. This insect may be known by the large, angular, setigerous hump on the prothorax, the peculiarly marked, somewhat flattened elytra, and the dense patch of pure white scales on the sides of the metasternum. It is very like *Scambus galeatus*, Boh., but is smaller and narrower, the dorsal prominence on the prothorax is not curved backward, the humeri are less explanate, &c.

13. *Cyrionyx cuneatus*, sp. n.

Rhomboidal, shining, fusco-castaneous, the rostrum, antennæ, and tibiæ ferruginous; mottled above with small, narrow, ochraceous scales intermixed with scattered darker scales, the former clustered into a short

streak on the fifth interstice towards the apex; the vestiture of the under surface and legs ochraceous. Rostrum feebly arcuate, cylindrical, moderately stout, longer than the head and prothorax, rugulose punctate at the sides towards the base, and for the rest almost smooth, the antennæ inserted at the middle. Prothorax short, conical, constricted in front, closely, minutely punctate, with indications of a smooth median line. Elytra triangular, rapidly and obliquely narrowing from the base, the humeri swollen; finely punctate-striate, the interstices rugulose, flat, 3, 7, and 9 narrowly costate at or near the base. Beneath closely punctate. Prosternal sulcus deep. Anterior coxæ narrowly separated. Femora sharply dentate.

Length $2\frac{1}{8}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. Very like *C. squamans*, but with the elytral vestiture finer, the elytra themselves obliquely narrowing from the swollen humeri, and with the interstices 3, 7, and 9 finely costate at the base, the anterior coxæ less approximate, the prosternal sulcus deep.

14. *Cyrionyx humeralis*, sp. n. (Tab. XI. figg. 20, 20 a, ♂.)

Subrhomboidal, piceous, the antennæ (and sometimes the rostrum also) ferruginous; mottled above with a dense clothing of small, oval, fuscous and cinereous (or ochraceous) scales, the prothorax with two broad dark vittæ (sometimes each divided into two spots) on the disc, the pallid scales on the elytra condensed into a short streak on the fifth interstice at its point of termination; the vestiture of the legs and under surface whitish or ochraceous. Rostrum moderately stout, feebly arcuate, long, fully reaching the apex of the metasternum in both sexes, striato-punctate in its basal half and sparsely punctate thence to the apex, a little smoother in the ♀, the antennæ inserted at about the middle. Prothorax transverse, constricted and much narrowed in front, the sides rapidly, arcuately converging from the base; densely, finely punctate. Elytra shining, triangular, rather convex, with dilated humeri, which are angular behind, the subapical callosities prominent; finely punctate-striate, the interstices rugulose, broad, and almost flat, 7 and 9 sometimes with a faint carina running down from the shoulder. Beneath rather sparsely punctate. Prosternal sulcus deep, bare. Ventral segments 1 and 2 depressed down the middle, and 5 broadly foveate, in the ♂. Legs rather stout; femora strongly dentate.

Length $3\frac{1}{2}$ –4, breadth $2\frac{1}{4}$ – $2\frac{2}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente (*Sallé*), Teapa (*H. H. Smith*); GUATEMALA, Telemán (*Champion*).

Six specimens. Recognizable from its allies by the angularly projecting humeri, mottled elytra, and flat dorsal interstices. *C. humeralis* is the representative of *C. turbidus* on the Atlantic slope.

15. *Cyrionyx turbidus*, sp. n. (Tab. XI. figg. 21, 21 a, ♀.)

Subovate, rather short, nigro-piceous or piceous; mottled above with a dense clothing of small, oval, fuscous and flavo-cinereous (or ochraceous) scales, the prothorax with two dark patches (sometimes united into a single vitta) on each side of the pallid median stripe, the pallid scales on the elytra condensed into a short streak on the fourth interstice below the base and another on the fifth at its point of termination, and the fuscous scales clustered into numerous spots; the vestiture of the under surface and legs ochraceous or whitish. Rostrum moderately stout, arcuate, long, about reaching the apex of the metasternum in the ♀, in the ♂ striato-punctate in its basal half and sparsely punctate thence to the apex, in the ♀ smoother and sparsely punctate throughout, the antennæ inserted near the middle. Prothorax transverse, rounded at the sides, constricted and much narrowed in front; densely, finely

punctate. Elytra subtriangular, rather convex; finely punctate-striate, the interstices broad, flat, and rugulose. Beneath rather sparsely punctate. Ventral segments 1 and 2 depressed down the middle, and 5 with a broad fovea, in the ♂. Anterior coxæ well-separated. Femora sharply dentate. Length $2\frac{1}{2}$ – $2\frac{4}{5}$, breadth $1\frac{2}{5}$ – $1\frac{3}{5}$ millim. (♂ ♀.)

Hab. GUATEMALA, Zapote, Pacific slope (*Champion*).

Seven specimens. Smaller and less robust than *C. humeralis*, the humeri obtuse. Larger than *C. nebulosus*, the fuscous scales on the prothorax and elytra clustered into numerous small scattered spots, the rostrum a little stouter, the prosternal sulcus deeper, the anterior coxæ less approximate.

16. *Cyrionyx lævirostris*, sp. n. (Tab. XI. fig. 22.)

Subovate, obscure ferruginous, the tarsi blackish; variegated above with a somewhat dense clothing of small, sordid ochreous and blackish scales, the dark scales on the elytra mostly clustered into a large, common, transverse, subquadrate, interrupted patch at the middle and a transverse space at or below the base, the prothorax with two dark vittæ on the disc and in one specimen a dark marginal line also; the vestiture of the under surface pale and rather close. Rostrum long, moderately curved, thickened at the base, smooth and slender in the ♀, rugulose at the base and a little stouter in the ♂, the antennæ inserted behind the middle in both sexes. Prothorax transverse, rounded at the sides from near the base, strongly constricted in front; densely, finely punctate. Elytra subtriangular, the humeri rather prominent; finely punctate-striate, the interstices rugulose and almost flat. Beneath closely punctate; prosternum rather deeply sulcate; ventral segment 1 with a broad, smoother, depressed, glabrous space extending down the middle in the ♂ and a shallower depression in the ♀. Anterior coxæ contiguous. Legs moderately long; femora acutely dentate.

Length $2\frac{1}{2}$ – $2\frac{2}{5}$, breadth $1\frac{1}{4}$ – $1\frac{1}{5}$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui 3000–8000 feet (*Champion*).

Two specimens. A species with a long, slender, almost smooth rostrum in the male, an irregular, common, transversely-subquadrate, dark patch at the middle of the elytra, and two dark vittæ on the prothorax, the rest of the vestiture of the upper surface close and in great part ochreous.

17. *Cyrionyx fuscitarsis*, sp. n.

Very like *C. lævirostris*, but with the elytral vestiture more mottled, the pallid scales sometimes condensed into a large apical patch or a transverse subapical fascia, the prothorax with a median line and a stripe midway between it and the margin ochraceous; the rostrum long, punctate to the tip in the ♂, very slender and almost smooth in the ♀; the prothorax more rounded at the sides, the anterior portion narrow and tubulate; the anterior coxæ narrowly separated.

Length $2\frac{3}{5}$ – $2\frac{9}{10}$, breadth $1\frac{2}{5}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Cerro Zunil (*Champion*).

Four specimens. This insect appears at first sight to be nothing more than a variety of *C. lævirostris* (the elytral markings being variable in both forms), but the somewhat thickly punctate rostrum of the male sufficiently distinguishes it. We also have a male from Chiriqui that probably belongs to the same species.

18. *Cyrionyx exiguus*, sp. n. (Tab. XI. figg. 23, 23 *a*, ♂.)

Subrhomboidal, rather convex, shining, black, the antennæ (the club excepted) ferruginous; the vestiture fine, close above, sparse beneath, long and piliform on the prothorax, somewhat squamiform on the rest of the surface: the prothorax ochreous or with a broad, oblique, ochreous vitta on each side; the elytra black, more or less mottled with white, the white scales sometimes clustered into a small spot at the middle of the fourth interstice; the legs and under surface with scattered whitish scales. Rostrum shining, strongly arcuate, stout, slightly longer than the head and prothorax, very sparsely, minutely punctate, rugulose at the sides towards the base, the antennæ inserted at a little behind the middle. Prothorax transverse, rapidly narrowing from near the base, strongly constricted in front; closely punctate, with a more or less distinct, smooth, raised, median line. Elytra triangular, deeply striate, the striæ faintly punctate, the interstices somewhat convex and sparsely punctulate. Prosternum broadly sulcate. Ventral segments sparsely punctate; 1 depressed down the middle and 5 obsolete foveate in the ♂. Legs rather stout; femora strongly dentate, the posterior pair not reaching the apex of the abdomen. Length $2\frac{2}{5}$, breadth $1\frac{1}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, San Gerónimo (*Champion*).

Three specimens, one with most of the fine ochreous vestiture of the prothorax abraded.

19. *Cyrionyx bilineatus*, sp. n. (Tab. XI. figg. 24, 24 *a*, ♀.)

Subovate, rather elongate, black, the elytra very shining, except at the shoulders; the prothorax with a sharply defined elongate streak on each side at the base and a stripe along the lower part of the flanks, the elytra with an elongate streak on the sixth interstice at the base and another on the disc at the apex, and the under surface, thickly clothed with white scales; the rest of the prothorax, the humeri, and the mesothoracic epimera with small brown scales; the vestiture of the legs and rostrum sparse, white. Rostrum stout, strongly arcuate, longer than the head and prothorax, smooth down the centre and at the apex, rugulose at the sides, the antennæ inserted at a little beyond the middle. Prothorax a little broader than long, gibbous, rounded at the sides, narrowed and constricted in front; densely, finely punctate. Elytra subtriangular, somewhat gibbous at the middle of the disc, constricted on each side behind the rather prominent humeri; narrowly striate, the striæ faintly punctate, the interstices flat at the base and very sharply costate thence to the apex, almost smooth, the rugulose humeral region excepted. Legs elongate, rather slender; femora sharply dentate; anterior and intermediate tibiae sharply, and the posterior tibiae feebly, unguiculate. Length 3, breadth $1\frac{2}{5}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen only of this peculiar form has been obtained, recognizable by the sharply-defined continuous white streak running down the base of the prothorax and the base of the elytra, the gibbous prothorax, the very sharply costate, shining, elytral interstices, the long legs, &c.

20. *Cyrionyx acute-costatus*, sp. n.

Subovate, black, the elytra more or less variegated with rufo-piceous at the base, sides, and apex, the tibiae and the base of the femora rufous, the rostrum partly rufescent; the vestiture fine: the prothorax with a median line and a faint line midway between it and the outer margin, and the elytra with a dense oblong streak on the disc towards the apex, the apex itself, and several small spots placed in a transverse irregular series below the base, white; the rest of the clothing of the prothorax and of the base of the elytra brownish, that of the under surface dense and white, the legs also with narrow white scales. Rostrum stout, arcuate, a little longer than the head and prothorax, smoother in the ♀ than in the ♂,

the antennæ inserted beyond the middle. Prothorax transverse, somewhat convex, rounded at the sides, constricted in front; densely, finely punctate. Elytra subtriangular, constricted on each side below the rather prominent humeri, transversely depressed on the disc below the base; narrowly and deeply punctate-striate, the interstices flat and rugulose at the base, and sharply costate and almost smooth thence to the apex. Beneath closely punctate; ventral segment 1 depressed down the middle in the ♂. Legs long; femora sharply dentate; anterior and intermediate tibiæ sharply, and the posterior tibiæ feebly, unguiculate.

Length $2\frac{4}{5}$ –3, breadth $1\frac{1}{3}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui 2500–4000 feet (*Champion*).

Three specimens. Nearly related to *C. bilineatus*, but wanting the continuous white submarginal stripe on the basal portion of the prothorax and elytra, the prothorax more transverse and not gibbous anteriorly, the elytral interstices rugulose at the base and not quite so sharply costate thence to the apex, the tibiæ and the base of the femora rufous.

21. *Cyrionyx semicostatus*, sp. n. (Tab. XI. fig. 25, var.)

Very like *C. apriatus* (infra); black or piceous, the antennæ and legs sometimes obscure ferruginous; the prothorax with a complete median line, and an interrupted curved stripe on each side, white; the elytra each with four white spots—one on the sixth interstice at the base, one on the second a little lower down, one at the sides (transverse) below it, and one on the disc towards the apex,—the inner interstices (the first, or sutural one, excepted) narrowly costate from a little below the base, the others somewhat angular; the vestiture of the under surface closer, white, dense along the lower parts of the flanks of the prothorax and on the metathoracic episterna.

Length $1\frac{1}{2}$ – $2\frac{1}{10}$, breadth $\frac{9}{10}$ – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Cubilguitz and Chacoj in Vera Paz (*Champion*).

Var. The prothorax with three uninterrupted white lines; the elytra with the white spot at the base of the sixth interstice extending downward to join the transverse mark below it.

Hab. PANAMA, David (*Champion*).

Eight specimens, the two from David (from one of which our figure is taken) being doubtless an extreme form of the same species. The cariniform inner elytral interstices is a character still more emphasized in some other members of the genus. The prothorax appears to be longer and broader in the male than in the female.

22. *Cyrionyx nitidipennis*, sp. n. (Tab. XI. figg. 26, 26 a.)

Oblong-rhomboidal, rather convex, shining, black, the antennæ, the base of the femora, and the tibiæ in part, ferruginous; the prothorax with three lines of intermixed fulvous and white adpressed hairs; the elytra with a few scattered pure white scales, which are clustered into a narrow oblique streak at the base, two minute spots below it, a transverse mark at the sides below the shoulder, and two oblong spots on the disc near the apex, the basal region also with scattered fulvous hairs; the vestiture of the legs and under surface sparse and fine, fulvous and white intermixed. Rostrum considerably longer than the head and prothorax, strongly arcuate, rather stout, striate and faintly punctate in its basal two-thirds, much smoother at the apex, the antennæ inserted at a little beyond the middle. Prothorax transverse, rounded at the sides from near the base, constricted in front; densely, finely punctate. Elytra elongate-triangular, flattened near the suture, the humeri rounded; deeply striate, the striae faintly punctate, the

first placed close to the suture, the interstices smooth and flat. Ventral segments very sparsely punctate.

Legs elongate, slender; femora acutely dentate; tibiæ sharply unguiculate.

Length $2\frac{1}{8}$, breadth 1 millim. (♀ ?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Distinguishable by the long, triangular, shining elytra, with small scattered patches of pure white scales near the base and apex, deeply-cut striæ, and smooth, flat interstices; the long, slender legs, &c.

23. *Cyrionyx apiatus*, sp. n. (Tab. XI. fig. 27.)

Subovate, rather shining, varying in colour from piceous, with the antennæ, elytra, and legs ferruginous, to entirely ferruginous; the vestiture very fine and sparse, ochraceous and ferruginous, the prothorax usually with one or two small white spots on each side and sometimes a faint whitish median line, the elytra with several small patches of coarser pure white scales—a spot on the second interstice below the base, a transverse mark at the sides in a line with it, and a spot on the disc towards the apex; the under surface and legs with scattered whitish scales. Rostrum stout, strongly arcuate, rugulose punctate and feebly carinate, sparsely punctate at the tip, a little smoother in the ♀, the antennæ inserted beyond the middle. Prothorax transverse, rounded at the sides, constricted in front; densely, finely punctate. Elytra subtriangular, the humeri somewhat prominent; very deeply striate, the striæ feebly punctate and nearly as broad as the interstices, the latter narrow, convex, becoming subcostate towards the apex, and more or less punctulate. Beneath closely punctate; ventral segment 1 broadly depressed down the middle in the ♂. Legs rather long; femora acutely dentate.

Length $1\frac{1}{2}$ – $2\frac{1}{10}$, breadth $\frac{7}{8}$ – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, San Juan and Senahu in Vera Paz (*Champion*).

Ten specimens, varying in colour (though the elytral spots are constant in position, and do not reach the base) and in the intensity of the puncturing of the elytral interstices. The broadly and deeply striate elytra, and the arrangement of the vestiture of the upper surface, separate *C. apiatus* from *C. sexguttatus* and *C. clathratus*. The rostrum is stout and comparatively short.

24. *Cyrionyx clathratus*, sp. n. (Tab. XI. figg. 28, 28 a, ♂.)

Subovate, rather narrow, nigro-piceous, the antennæ obscure ferruginous; the prothorax with intermixed white and ochreous, hair-like scales, the white scales condensed into three lines on the disc and a transverse streak on the flanks near the anterior margin, and the ochreous scales into a faint transverse fascia across the middle of the posterior lobe; the elytra each with the following white markings—a transverse curved fascia below the base, extending forward along the suture, and sometimes connected with a short streak on the base of the sixth interstice, an oblique or triangular patch on the disc towards the apex, and a small streak at the tip,—the rest of their vestiture fuscous; the under surface with white and ochreous, hair-like scales, the metathoracic episterna with pure white scales; the vestiture of the legs and rostrum sparse and white. Rostrum strongly arcuate, rather stout, moderately long, rugulose and faintly carinate, smoother at the tip, the antennæ inserted beyond the middle. Prothorax transverse, rounded at the sides from near the base, constricted in front, densely, finely punctate. Elytra subtriangular, with rather prominent humeri; deeply punctate-striate, the interstices rugulose and somewhat convex. Beneath closely punctate; ventral segments 1 and 2 slightly depressed down the middle in the ♂. Legs long; femora acutely dentate.

Length 2, breadth 1 millim. (♂ ♀.)

Hab. GUATEMALA, Cerro Zunil, Zapote, San Gerónimo (*Champion*).

Three specimens. The complete transverse, arcuate, white fascia below the base of each elytron separates *C. clathratus* from other allied forms with patches of white scales on the upper surface.

25. *Cyrionyx apicalis*, sp. n. (Tab. XI. figg. 29, 29a, ♀.)

Ovate, convex, rather shining, black, the legs and antennæ piceous; the vestiture close and fine: the head and scutellum, the prothorax with a median line and a curved submarginal vitta on each side, the elytra with a patch on each shoulder and the apical third, the under surface and legs, white, the rest of the upper surface black. Rostrum moderately stout, strongly arcuate, rugulosely punctate at the base and very sparsely punctured thence to the apex, the antennæ inserted at a little behind the middle. Prothorax transverse, rounded at the sides from near the base, constricted in front; densely, finely punctate. Elytra subtriangular, with narrow, deep striæ, the striæ obsoletely punctate, the interstices broad, almost flat, rugulose. Beneath closely punctate. Legs rather stout; femora with a small, acute tooth, the posterior pair not reaching the apex of the abdomen; tarsal claws very small, subconnate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. The albo-trivittate prothorax and the white humeral spot and large apical patch on the elytra distinguish *C. apicalis*. The legs are comparatively short and stout.

26. *Cyrionyx alboplagiatus*, sp. n. (Tab. XI. fig. 30.)

Subovate, rather shining, nigro-piceous, the femora and tibiæ obscure ferruginous; the vestiture close: the prothorax with a median line and a marginal stripe on each side, and the elytra with an oblong patch on the second interstice below the base, an interrupted streak running down the basal half of the sixth interstice and extending outwards below the humeri, and an elongate-triangular patch on the disc towards the apex, white, the rest of their surface fuscous, the head, under surface, and legs white. Rostrum arcuate, stout, not longer than the head and prothorax, thickened and rugulose at the base, the apical half almost smooth. Prothorax transverse, rounded at the sides, constricted in front; densely, finely punctate. Elytra subtriangular, with narrow, deep, feebly punctate striæ, the interstices broader than the striæ, rather convex, and densely rugulose. Beneath closely punctate.

Length $1\frac{2}{3}$, breadth 1 millim. (♀.)

Hab. GUATEMALA, La Tinta in the Polochic valley (*Champion*).

One specimen. Smaller and less robust than *C. apicalis*, the rostrum shorter, the outer white stripe on the prothorax marginal, the white scales on the elytra differently arranged. The striæ are finer than in *C. clathratus*. The markings on the outer part of the elytra form an irregular, interrupted, curved stripe.

27. *Cyrionyx sexguttatus*, sp. n. (Tab. XI. fig. 31.)

Subovate, rather convex, piceous, the antennæ, tip of the rostrum, and legs more or less ferruginous; clothed with minute brownish and coarser whitish and ochreous scales, the latter condensed into a broad space on each side of the prothorax and various sharply-defined spots or patches on the elytra—a spot on the second interstice below the base (extending faintly downward to the apex), a transverse patch on each side below the shoulder (extending down the sixth and eighth interstices), and a rather large spot on the disc towards the apex; the vestiture of the legs and under surface whitish. Rostrum arcuate, not longer than the head and prothorax, sparsely punctate. Prothorax transverse, rounded at the sides, constricted in front; densely, finely punctate. Elytra triangular, deeply striate, the striæ narrow and feebly

punctate, the interstices broader than the striae, rugulose, and slightly convex. Beneath closely punctate. Anterior coxae narrowly separated. Legs long, rather slender; femora acutely dentate. Length $2\frac{1}{10}$, breadth $1\frac{1}{10}$ millim. (♀?)

Hab. PANAMA, Peña Blanca 3000 feet (*Champion*).

One specimen. The ochreous sides of the prothorax and the shape and position of the patches of coarser whitish scales on the elytra sufficiently distinguish *C. sexguttatus* from *C. apiatus* and others. The elytral interstices are much wider than the striae.

28. *Cyrionyx niveipictus*, sp. n. (Tab. XI. fig. 32.)

Subovate, rather narrow, convex, ferruginous; thickly clothed with minute, narrow scales, which are ochreous on the prothorax (a whitish median line, and a darker space on each side of it, excepted) and ferruginous on the elytra, and with various small sharply-defined patches of coarser, pure white, glistening scales—a spot on each side of the prothorax in front and another above each anterior coxa, a streak at the base of the fifth elytral interstice, an oblique streak near the middle of each elytron, and a small spot at their apex, an elongate patch on the metathoracic episterna, and a streak on the mesothoracic episterna; the vestiture of the head, legs, and under surface sparse, whitish or ochreous, denser and wholly whitish on the median third of the metasternum. Rostrum stout, strongly arcuate, longer than the head and prothorax, striate and carinate to near the tip, the antennae inserted at about the middle. Prothorax transverse, rounded at the sides from near the base, strongly constricted in front; densely, finely punctate. Elytra subtriangular, rather long; deeply striate, the striae faintly punctate, the interstices rugulose and feebly convex. Beneath closely punctate. Legs long; femora acutely dentate.

Length 2, breadth 1 millim. (♀?)

Hab. PANAMA, Peña Blanca 3000 feet (*Champion*).

One specimen, probably mature. A handsome little insect, with small, dense patches of pure white glistening scales—eight above and three on each side beneath.

29. *Cyrionyx ochreonotatus*, sp. n. (Tab. XI. fig. 33.)

Ovate, convex, black; the prothorax with a broad vitta on each side, and the elytra with a large, rounded spot near the suture below the base, a smaller spot in a line with it on the outer margin, and a triangular patch on the outer part of the disc near the apex, densely clothed with oval, ochreous scales: the rest of the vestiture of the upper surface fine and sparse, blackish above (a faint whitish median line on the prothorax excepted) and whitish beneath and on the legs. Rostrum strongly arcuate, not very stout, rugulose in its basal half and smoother thence to the tip, the antennae inserted at the middle. Prothorax transverse, rounded at the sides from near the base, constricted in front; densely, finely punctate. Elytra subtriangular, deeply striate, the striae feebly punctate, the interstices rugulose and rather convex. Beneath closely punctate; ventral segments 1 and 2 broadly depressed down the middle. Legs moderately long; femora acutely dentate.

Length 2, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. The dense patches of coarse ochreous scales on the prothorax and elytra readily distinguish *C. ochreonotatus*.

30. *Cyrionyx ambatoides*, sp. n. (Tab. XI. fig. 34.)

Subovate, rather narrow, nigro-piceous, the antennae and legs obscure ferruginous; the vestiture close and squamiform, above and beneath: the prothorax with three sharply-defined, narrow, white vittae, the

submarginal one continued down the disc of each elytron to the apex, and sometimes divided into three spots or streaks, the rest of the vestiture of the upper surface blackish-brown, that of the under surface wholly white, the legs and rostrum with narrow whitish scales. Rostrum arcuate, moderately stout, rugulose and finely carinate, smoother at the tip, the antennæ inserted beyond the middle. Prothorax transverse, rounded at the sides from near the base, feebly constricted in front; densely, finely punctate. Elytra subtriangular, finely punctate-striate, the interstices flat and rugulosely punctate. Beneath closely punctate; first ventral segment excavate down the middle in the ♂. Legs long; femora acutely dentate; anterior and intermediate tibiæ somewhat curved.

Length $2\frac{1}{5}$ – $2\frac{1}{4}$, breadth $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Three specimens. In this insect the prothorax and elytra have a continuous (or interrupted) submarginal white stripe, as in various *Ambates*; the vestiture of the under surface, too, is close and white. The finely striate elytra, with flat interstices, separate *C. ambatoides* from *C. clathratus* and its allies.

31. *Cyrionyx oblongoguttatus*, sp. n. (Tab. XI. fig. 35.)

Subovate, obscure ferruginous; the prothorax and elytra mottled with minute ochreous and blackish scales, the ochreous scales on the prothorax condensed into a curved, interrupted band on each side of the disc and a small spot at the middle of the subapical constriction, the elytra each with a dense, oblong patch of coarser, whitish scales on the disc towards the apex (extending from the third to the fifth stria); the sparse vestiture of the head and under surface whitish, that of the legs ochreous. Rostrum arcuate, not longer than the head and prothorax, moderately stout, rugulose at the sides, smooth along the centre, the antennæ inserted beyond the middle. Prothorax transverse, rather convex, rounded at the sides, strongly constricted in front; densely, finely punctate. Elytra subtriangular, the humeri somewhat prominent; finely punctate-striate, the interstices rugulose and feebly convex. Ventral segments sparsely punctate, 1 depressed down the middle. Legs elongate; femora acutely dentate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

One specimen. More elongate than *C. biplagiatus*, Faust, from Venezuela, the rostrum smoother, the anterior coxæ contiguous, the legs much longer, &c. The dense oblong white patch on each elytron is similarly placed in the two species.

32. *Cyrionyx squamans*, sp. n.

Subrhomboidal, shining, piceous, the rostrum, antennæ, femora, and tibiæ partly or entirely ferruginous; the vestiture dense and squamiform: the prothorax and elytra mottled with brown and ochraceous (or whitish), the pallid scales on the prothorax condensed into a median and a submarginal vitta, and those on the elytra sometimes clustered into an oblong spot on the fourth interstice before the middle and a large patch or oblong streak on the disc towards the apex; the scales on the under surface and legs wholly whitish or ochraceous. Rostrum stout, arcuate, longer than the head and prothorax, sparsely punctate, rugulose and faintly carinate at the base, the antennæ inserted at the middle. Prothorax transverse, conical, feebly constricted in front; densely, finely punctate. Elytra broad at the base, subtriangular; finely punctate-striate, the interstices broad, flat, and rugulose. Beneath closely punctate. Prosternal sulcus shallow. Legs rather stout; femora sharply dentate.

Length $2\frac{1}{2}$ – $2\frac{2}{3}$, breadth $1\frac{2}{5}$ – $1\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

Three specimens. The conical, fusco-bivittate prothorax, the dense, squamiform, mottled vestiture of the elytra, and the long rostrum characterize *C. squamans*. The elytra are somewhat rounded at the sides. The conical prothorax and the subcontiguous anterior coxæ separate the present species from *C. turbidus*, which in other respects is very similar.

33. *Cyrionyx nebulosus*, sp. n.

Ovate, piceous, the antennæ, femora, and tibiæ, and sometimes the rostrum also, reddish or ferruginous; densely squamose, the scales on the elytra oval and somewhat imbricate, those on the under surface also coarse: varying in colour above according to the predominance of the brown or of the whitish scales, the brown scales on the prothorax condensed into two vittæ on the disc (sometimes reduced to four spots) and a marginal stripe, the elytra clouded with brown and white, the white scales on the elytra usually condensed into a short streak on the fourth interstice below the base and a patch on the disc at about one-third from the apex; the vestiture of the under surface entirely whitish. Rostrum feebly arcuate, moderately stout, long, in the ♀ nearly reaching the apex of the metasternum, thickly, finely punctate, the apical half smoother, especially in the ♀, the antennæ inserted behind the middle. Prothorax transverse, rounded at the sides, constricted and much narrowed in front, bisinuate at the base; densely, finely punctate. Scutellum small. Elytra considerably wider than the prothorax, the humeri not prominent; finely punctate-striate, the interstices flat and densely punctulate. Beneath closely punctate; ventral segments 1 and 2 shallowly depressed down the middle in the ♂. Femora each with an acute tooth.

Length $1\frac{7}{8}$ – $2\frac{1}{2}$, breadth 1 – $1\frac{1}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente (*Sallé*), Teapa (*H. H. Smith*); BRITISH HONDURAS, Rio Sarstoon (*Blancaneaux*); GUATEMALA, Cahabon, San Juan, La Tinta, Tamahu, and Purula in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui, Caldera, Taboga I. (*Champion*).

Apparently a common insect in Central America, and varying in the markings of the upper surface. The elytra are more finely striate than in *C. turbidus*, and the vestiture is closer, the darker scales not clustered into numerous small spots. In its general shape *C. nebulosus* is more ovate than the allied forms.

34. *Cyrionyx fuscovarius*, sp. n.

Very like *C. nebulosus* and differing as follows:—The vestiture dense, yellowish-white, the upper surface faintly mottled with white, the prothorax with four small fuscous spots on the disc, the elytra variegated with irregular, sharply-defined, fuscous markings, an oblong patch near the suture below the base larger than the rest; the prothorax obliquely narrowing from the base.

Length $1\frac{7}{8}$ – $2\frac{2}{5}$, breadth $1\frac{1}{10}$ – $1\frac{1}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, San Gerónimo and Capetillo (*Champion*).

The description is taken from three specimens from San Gerónimo, the single example, from Capetillo, being worn.

The following species was overlooked till it was too late to include it in the Table:—

18(A). *Cyrionyx exaratus*, sp. n.

Rhomboidal, shining, black; the sides of the prothorax broadly, the under surface and legs sparsely, clothed with very fine, hair-like, white scales, the scutellum also albe-squamose, the elytra almost bare. Rostrum strongly arcuate, stout, a little longer than the prothorax, finely punctate, the apical half almost smooth, the antennæ inserted at the middle. Prothorax transverse, with the sides arcuately converging from the base, strongly constricted in front; finely, somewhat closely punctate, the punctuation becoming denser and confluent towards the sides and on the flanks. Elytra triangular, convex, compressed at the sides; punctato-sulcate, the interstices almost smooth, narrow and very convex throughout. Beneath closely, the abdomen sparsely, punctate; fifth ventral segment deeply foveate. Anterior coxæ narrowly separated. Prosternum sulcate. Femora sharply unidentate. Tarsal claws connate, very small.

Length $2\frac{1}{10}$, breadth $1\frac{1}{5}$ millim. (♂.)

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*).

One specimen. Near *C. exiguus*, the prothorax much more sparsely punctate and bare on the disc, the elytra more convex, with the interstices smoother and narrowly raised throughout.

Sect. NERTIDES.

Nertides and *Madopterides*, Lacordaire.

This section includes a few Tropical-American genera, mainly recognizable by their elongate general shape, and long, cylindrical, almost straight rostrum, with gradually descending scrobes. The tarsi are greatly dilated in the typical forms. *Iasides* is provisionally placed in it for the present.

NERTUS.

Nertus, Schönherr, Gen. Curc. viii. 1, p. 76 (1844); Lacordaire, Gen. Col. vii. p. 240.

The few known members of this Tropical-American genus are of elongate, subelliptic or fusiform shape, and have the general facies of some of the narrower species of *Cholus*, from which they may be readily separated by the ascending mesothoracic epimera, &c. The two Central-American forms have the second and third joints of the anterior and intermediate tarsi very broadly, and those of the posterior tarsi less strongly, dilated.

1. *Nertus suturalis*. (Tab. XII. figg. 3, 3a, ♀.)

Nertus suturalis, Boh. in Schönh. Gen. Curc. viii. 1, p. 78¹.

Hab. MEXICO, Jalapa (*Höge*).—BRAZIL, Minas Geraes¹.

We have two females of this species from Jalapa, easily recognizable by the toothed, unguiculate anterior tibiæ, and the dense line of coarse yellowish-white scales along

the suture of the elytra and the base of the prothorax, the elytra also with an interrupted, oblique fascia at one-third from the apex and various scattered streaks of similarly-coloured scales on the anterior half of the disc and at the tip.

2. *Nertus æneus*, sp. n. (Tab. XII. figg. 4, 4 a, ♂.)

Elongate, narrow, fusiform, shining, black with a bright æneous lustre; somewhat thickly clothed with long, coarse, hair-like, ochreous scales, the scales on the elytra clustered into fascicles over the whole of the surface, the prothorax with a bare space down the middle. Head finely punctate; rostrum almost straight, depressed at the base, rather longer than the head and prothorax, sparsely, finely punctate; joints 2-7 of the funiculus short, rapidly widening outwards, 3-7 transverse. Prothorax broader than long, gradually narrowing from the base, the sides rounded anteriorly, feebly constricted in front; closely, finely punctate, except along a narrow space down the middle. Elytra elongate, of about the same width as the prothorax, narrowing from near the base, the apices narrow and separately rounded; finely punctate-striate, the interstices flat, here and there with clusters of finer squamigerous punctures, for the rest smooth. Prosternum shallowly sulcate, the intercoxal portion as wide as the apex of the rostrum. Ventral segments sparsely, finely punctate, 1 flattened and rugulose punctate down the middle, 5 shallowly arcuate-emarginate at the apex. Femora deeply excised towards the apex, the anterior pair triangularly dilated. Tibiæ hairy at the apex, the anterior pair strongly sinuate within and with the apical spur long and broadly dilated, the posterior pair bisinuate. Tarsi clothed with long hairs. Length 8, breadth 3 millim. (♂.)

Hab. COSTA RICA, Savanillas de Pirris (*Underwood*).

One specimen. This insect is of about the size and shape as *Cholus tenuis*, but may be readily distinguished from it by the ascending mesothoracic epimera, the slender, almost straight rostrum, &c. The spur of the anterior tibiæ is developed into a long, flattened process, a character probably peculiar to the male sex.

STRONGYLOTES.

Strongylotes, Schönherr, Gen. Curc. iii. p. 627 (1836); viii. 1, p. 74; Lacordaire, Gen. Col. vii. p. 239.

Three species of this Tropical-American genus have been described, their distribution ranging from Mexico to Brazil. They mainly differ from *Nertus* in their parallel-sided general shape.

1. *Strongylotes brachialis*.

Strongylotes brachialis, Boh. in Schönh. Gen. Curc. viii. 1, p. 75¹.

Hab. MEXICO (*Mus. Imp. Russ.*¹).

Unknown to me. "Black, with rufo-testaceous antennæ and legs, almost glabrous above, squamose beneath; the prothorax thickly, rugosely punctate and feebly carinate; the elytra deeply striate, with narrow, convex, almost smooth interstices; the femora obtusely dentate."

2. *Strongylotes parallelus*, sp. n. (Tab. XII. figg. 5, 5 a.)

Elongato, narrow, cylindrical, flattened above, shining, black, the antennæ in part and the tips of the tarsi ferruginous; beneath thickly, above sparsely, clothed with rather coarse, oblong, whitish scales. Head finely punctate; rostrum slender, almost straight, about as long as the head and prothorax, sparsely, finely punctate, the antennæ inserted behind the middle, joint 1 of the funiculus as long as 2-4 united, the club ovate. Prothorax longer than broad, narrowed at the apex, the sides parallel thence to the base, the base feebly bisinuate; closely punctate, except along a narrow smooth space down the middle. Elytra parallel, about twice the length of the prothorax, and of nearly the same width, subtruncate at the base, and conjointly rounded at the apex, leaving the pygidium narrowly exposed; punctate-striate, the interstices flat and irregularly punctate. Beneath closely, the ventral segments more sparsely, punctate; prosternum slightly depressed down the middle, the anterior coxæ narrowly separated. Legs slender; femora sublinear, unarmed, pilose beneath; tarsi narrow, the third joint strongly bilobed, the claws connate at the base.

Length $5\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♀?)

Hab. MEXICO, Ciudad in Durango, 8100 feet (*Forrer*).

Two specimens, both somewhat abraded. This species seems to be nearly related to *S. brachialis*, which also has narrow tarsi, thus differing from *S. squamans* and *S. lemniscatus*, Boh.

TRACHYMEROPSIS, gen. nov.

Mandibles straight on their inner edge; rostrum cylindrical, almost straight, as long as, or a little longer than, the prothorax, the scrobes gradually descending; eyes large, distant; prothorax subcylindrical to near the apex, without ocular lobes, bisinuate at the base, the median lobe short and truncate; scutellum transversely subquadrate; elytra long, not wider than the prothorax; pygidium not visible; prosternum shallowly depressed down the middle anteriorly, the broad intercoxal portion flattened; mesosternum almost on a level with the prosternum, extending broadly backward between the middle coxæ; ventral segments 1 and 2 long, subconnate; anterior legs moderately long, the others shorter, the posterior femora barely reaching the third ventral suture; femora stout, abruptly excavate near the apex beneath, unarmed; tibiæ short, slightly sinuate, the anterior and intermediate pairs strongly, the posterior pair more feebly, unguiculate; anterior and intermediate tarsi with joints 2 and 3 broadly dilated in both sexes, but much more strongly so in ♂ than in ♀; tarsal claws minute, connate; body narrow, elongate-elliptic, polished, and in great part glabrous.

Type, *T. palmipes*.

The type of this species is very like *Azygides stygius*, Pascoe, from Parana (which has a single tarsal claw, and was placed by its describer near *Parallelosomus*), but belongs to the "Nertides," as defined by Lacordaire, near *Trachymerus*. It has the anterior and intermediate tarsi greatly dilated in both sexes, but more strongly so in the male than in the female. The more widely separated anterior coxæ, the subconnate first and second ventral segments, the short posterior legs, the minute tarsal claws, and the subcylindrical shape of the body, separate *Trachymeropsis* from *Nertus*.

1. *Trachymeropsis palmipes*, sp. n. (Tab. XII. figg. 6, 6 a, ♂.)

Very shining, black, the antennæ fusco-ferruginous; the elytra and under surface with scattered coarse white scales, those on the elytra condensed into a short streak at the base of the suture, a few small spots on the disc exterior to it, an irregular, interrupted post-median fascia, and several small spots near the apex;

the basal margin of the prothorax and the legs clothed with hair-like white scales. Head sparsely punctate; rostrum rather slender, very sparsely, faintly punctate, the antennæ inserted at the middle, joints 3-7 of the funiculus widening outwards, more or less transverse, 1 nearly as long as 2-4 united, the club oblong-ovate and rather small. Prothorax convex, broader than long, much narrowed in front, the sides strongly rounded anteriorly and parallel behind; very sparsely, minutely punctate, smooth along the middle. Elytra very gradually narrowing from a little below the base, the apices divergent and somewhat produced; sharply striate, the striæ with oblong scattered punctures, the interstices flat, with small, widely-scattered clusters of fine squamigerous punctures, for the rest smooth. Ventral segments very sparsely, finely punctate.

Length $3\frac{1}{2}$ - $5\frac{1}{4}$, breadth $1\frac{1}{8}$ - $1\frac{3}{8}$ millim. (σ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Eight specimens.

MADOPTERUS.

Madopterus, Schönherr, Gen. Curc. iii. p. 734 (1836); Lacordaire, Gen. Col. vii. p. 244.

A Tropical-American genus, including two known forms, a third being now added. *Madopterus* is so closely related to *Nertus* that it must be referred to the same section of the Barina. The tarsal claws at first sight appear to be single.

1. *Madopterus cylindricus*. (Tab. XII. fig. 7.)

Madopterus cylindricus, Boh. in Schönh. Gen. Curc. viii. 1, p. 81¹.

Hab. MEXICO¹.

The type of this insect (apparently a female) has been communicated by Dr. Sjöstedt. It is very like the following species, but has the upper surface almost bare (a line of white scales along the basal margin of the prothorax excepted), and the oblique depression below the base of the elytra deeply impressed.

2. *Madopterus conradti*, sp. n. (Tab. XII. figg. 8, 8 a, ♂.)

Elongate, narrow, somewhat flattened above, shining, black; above (a broad bare space down the middle of the prothorax, extending from the apex to very near the base, excepted) rather sparsely, and the under surface thickly, clothed with elongate, coarse, yellowish-white or ochreous scales, those on the legs finer and hair-like. Head closely punctate, with a small narrow fovea between the eyes; rostrum cylindrical, rather slender, almost straight, as long as the prothorax, sparsely punctate, smoother in the ♀, the antennæ inserted beyond the middle, joint 1 of the funiculus about as long as 2 and 3 united, the club large, flattened, and eblong-ovate in the ♂, smaller in the ♀. Prothorax much longer than broad, obliquely narrowing from near the base, sparsely punctate, with a narrow, ill-defined, smooth space down the middle. Elytra less than twice the length of the prothorax, parallel in their basal half; deeply punctate-striate, the interstices narrow, convex, irregularly and rather coarsely uniseriate-punctate. Beneath closely punctate; ventral segments 1 and 2 with a flattened bare space down the middle in the ♂. Femora unarmed. Tarsal joints 2 and 3 broadly dilated; claws connate to near the tip.

Length $6\frac{3}{8}$ - $6\frac{1}{2}$, breadth $2\frac{1}{10}$ millim. (σ ♀.)

Hab. GUATEMALA, Coban in Alta Vera Paz (*Conradt*).

One pair. Closely related to the Mexican *M. cylindricus*, but clothed with coarse, whitish or ochreous, elongate scales above and beneath.

IASIDES, gen. nov.

Mandibles slightly emarginate on the inner side before the tip; rostrum cylindrical, nearly straight, slender, as long as the head and prothorax, the scrobes gradually descending; head globose; eyes large, narrowly separated above; prothorax long, conical, bisinuate at the base, the median lobe short and truncated; scutellum small, rounded, sulcate; elytra long, a little wider than the prothorax, narrowing from the shoulders, which are armed with a small compressed prominence in front, the basal margin of each elytron separately rounded and sharply raised inwards; pygidium not visible; prosternum deeply sulcate; anterior coxæ very narrowly, the others widely, separated; mesosternal side-pieces largely developed; ventral segments 1 and 2 long, connate; legs moderately long; femora sublinear, unarmed, the posterior pair reaching the apex of the abdomen; tibiæ unguiculate; tarsi with joint 3 strongly bilobed; tarsal claws long, subconnate at the base; body subfusiform, convex, polished, almost bare.

Type, *I. cincticollis*.

The single species from Panama on which this genus is based has the rostrum, &c., formed as in the "Nertides," amongst which it can be included for the present; the anterior and intermediate tarsi, however, are not dilated as in *Nertus*, *Trachymeropsis*, &c.

1. *Iasides cincticollis*, sp. n. (Tab. XII. figg. 9, 9 a.)

Moderately elongate, very shining, black; the prothorax with a narrow space across the base, the sterna, rostrum, and legs, and a small space at the sides of the ventral segments 3-5, clothed with hair-like white scales, the rest of the surface bare. Head foveate between the eyes; rostrum rugulosely punctate and carinate to near the tip, the antennæ inserted just behind the middle, joint 2 of the funiculus nearly as long as 1, the club acuminate-ovate. Prothorax slightly longer than broad, faintly constricted towards the anterior margin, the base and apex very finely punctate, the rest of the upper surface smooth. Elytra with rows of minute punctures, the sutural and marginal striae sharply-defined, the others just traceable, the interstices smooth and flat. Beneath somewhat coarsely punctate, the ventral segments almost smooth, 1 shallowly depressed down the middle.

Length $4\frac{1}{2}$, breadth 2 millim. (σ ?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen.

Sect. DIORYMERIDES.

Dyormérides (sic), Lacord.

The two genera referred to this section by Lacordaire are both represented in Mexico or Central America, whence a third is now added. They have the femora broadly sulcate beneath for the reception of the tibiæ in repose (thus differing from nearly all the Centrinides), and in some species of *Diorymerus* the anterior tibiæ are also hollowed for the reception of the tarsi. The rostral canal is broad and very deep, extending on to the anterior portion of the metasternum in *Coleomerus*.

COLEOMERUS.

Coleomerus, Schönherr, Gen. Curc. iii. p. 817 (1836); Lacordaire, Gen. Col. vii. p. 218.

The two described species of *Coleomerus* are from Cayenne and the Antilles respectively, and a third (from Cayenne) was noted by Lacordaire. Two others from BIOL. CENTR.-AMER., Coleopt., Vol. IV. Pt. 5, July 1907.

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Central America are now added. In this genus the very deep rostral canal extends into the intercoxal portion of the metasternum, as in many Cryptorrhynchids, and it is dilated on each side in front of the anterior coxæ.

1. ***Coleomerus isthmicus***, sp. n. (Tab. XII. figg. 10, 10 *a*, *b*.)

Coleomerus mexicanus, Solari, in litt.

Somewhat rhomboidal, flattened above, shining black, the antennæ ferruginous at the base. Head closely, finely punctate and also sulcate above between the very large, narrowly-separated eyes; rostrum moderately stout, longer than the prothorax, widened at the apex, thickly punctate (except along the middle), smoother in the ♀. Prothorax rapidly narrowing from the base, sparsely, minutely punctate, the punctuation becoming coarser and closer at the sides. Scutellum very small, triangular. Elytra subcordate, rapidly narrowing from a little below the base, depressed along the suture; very deeply striate throughout, the striæ feebly punctate, the interstices flat and almost smooth. Beneath rather coarsely punctate, the punctures on the propleura closely placed. Legs short.

Length $2\frac{4}{5}$ –4, breadth $1\frac{3}{4}$ – $2\frac{1}{2}$ millim.

Hab. MEXICO (*Höge*, in coll. *Solari*); GUATEMALA, Cahabon, Lanquin, Chacoj, San Juan and Panima in Vera Paz (*Champion*); PANAMA, Bugaba, San Feliz (*Champion*).

Numerous specimens, the one from Mexico much larger than the others. Near *C. lugubris*, Boh. (the type of which I have seen), but with the prothorax and elytra more rapidly narrowed from the base (the general shape being subrhomboidal, not short ovate), the elytra more deeply striate. *C. ebeninus*, Boh., from the Antilles, is said to have the head and rostrum smooth, &c.

2. ***Coleomerus rotundatus***, sp. n.

Rotundate-ovate, flattened above, shining black. Head closely punctate, sulcate above between the very large, narrowly-separated eyes; rostrum rather slender, longer than the prothorax, sparsely punctate at the sides only, flattened, smooth, and dilated at the apex; joint 1 of the funiculus nearly as long as 2–5 united, the club short-ovate. Prothorax sparsely, minutely punctate, except along a narrow space down the middle, the sides finely strigose. Scutellum very small, subquadrate. Elytra rounded at the sides, as well as at the broad apex, depressed along the suture; deeply striate, the striæ conspicuously punctate the interstices smooth and flat. Beneath sparsely punctate, the punctures on the ventral segments very fine and those on the meso- and metapleura coarse, the propleura sinuato-strigose, hollowed for the reception of the anterior femur. Legs very short.

Length $3\frac{1}{5}$, breadth 2 millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. Smaller than *C. lugubris*, Boh., the rostrum more slender, the propleura hollowed and strigose, the elytral striæ deeper and conspicuously punctate, the legs very short. The more rounded outline, subquadrate scutellum, strongly punctured striæ, strigose propleura, and much shorter legs separate it from *C. isthmicus*.

COLEOMEROPSIS, gen. nov.

Prosternum strongly produced behind, covering the mesosternum, deeply sulcate to the apex, the posterior portion again excavate for the reception of the apex of the rostrum; metasternum unimpressed; eyes not approximate above; prothorax deeply bisinuate at the base, the median lobe almost covering the scutellar

cavity, the scutellum reduced to a minute point; pygidium not visible; femora deeply sulcate and unarmed beneath; tarsal claws connate at the base; first ventral suture strongly arcuate; body elliptic, flattened above, sparsely squamose.

This genus, based upon a single species from Guatemala, is closely related to *Coleomerus*, differing from it in having the very deep rostral channel terminating in the produced portion of the prosternum, the eyes well-separated, the median lobe of the prothorax more produced, and the scutellum reduced to a minute point. The rostrum in the unique example obtained was so tightly locked in the cavity that the apical portion has unfortunately been broken off when an attempt was made to lift it.

1. *Coleomeropsis cribricollis*, sp. n. (Tab. XIII. figg. 21, 21 a.)

Nigro-piceous with a slight brassy lustre, shining, rather sparsely clothed with flavo-cinereous, hair-like scales, the vestiture of the under surface and legs finer and cinereous. Head densely, finely punctate; rostrum moderately stout, curved, about as long as the prothorax, rugosely punctate; eyes moderately large, separated by about the width of the rostrum. Prothorax broader than long, conical, very feebly constricted in front; densely, very coarsely punctate. Elytra gradually narrowing from the base, somewhat rounded at the sides; punctato-sulcate, the interstices flat, asperato-punctate. Beneath closely punctate. Legs very short.

Length $2\frac{1}{3}$, breadth $1\frac{1}{2}$ millim.

Hab. GUATEMALA, San Isidro, near Mazatenango, Pacific slope, 1600 feet (*Champion*).

DIORYMERUS.

Diorymerus, Schonherr, Curc. Disp. Meth. p. 311 (1826); Gen. Curc. iii. p. 799; Lacordaire, Gen. Col. vii. p. 219.

Diorygomerus, Gemminger and Harold, Cat. Col. viii. p. 2618.

A well-marked genus including a large number of Tropical-American forms, few of which have been described as yet. Not a single species has hitherto been ascribed to our region, whence twenty-five are now recorded, all of which are treated as new. The Central-American forms are mostly of small size, and, with a few exceptions, shining black in colour, resembling small polished seeds. The species are difficult to distinguish, but good characters are to be found in the armature of the femora and tibiæ, the form of the rostrum, the presence or absence of shallow basal foveæ on the prothorax, the shape of the scutellum, the striation of the elytra, and the sculpture of the pleura. The prothorax is regularly convex in all the species now added, the male of *D. lævipes* excepted.

a. Femora unarmed.

α^1 . Intermediate and posterior tibiæ, and sometimes the anterior tibiæ also, dentate or angulate near the base externally.

α^2 . Anterior femora not (except in Species 4 and 5) conspicuously widened at the base.

α^3 . All the tibiæ denticulate on their inner edge; scutellum transverse: length of body 3–4 mm.

- a^4 . Elytra striate Species 1.
 b^4 . Elytra with the sutural stria only distinct* Species 2.
 b^3 . Anterior tibiae only denticulate on their inner edge; scutellum transverse; elytra with a fine sutural stria only: length of body $2\frac{2}{3}$ mm. Species 3.
 c^3 . Tibiae not denticulate on their inner edge.
 c^4 . Anterior tibiae toothed or angulate externally near the apex, as well as near the base, and widened for about their median third; elytra with the sutural stria only distinct.
 a^5 . Body wholly black Species 4, 5.
 b^5 . Body black, the elytra rufo-testaceous Species 6.
 d^4 . Anterior tibiae hollowed externally, not widened in their median third; head deeply, transversely sulcate; scutellum subquadrate; elytra with the sutural stria only distinct Species 7.
 e^4 . Anterior tibiae distinctly toothed near the apex externally, the other tibiae dilated and acutely dentate near the base; prothorax and elytra conspicuously punctate, the elytra striate Species 8.
 f^4 . Anterior tibiae (except in *D. ornatus*) not or feebly toothed near the apex externally; scutellum subquadrate or transverse.
 c^5 . Elytra deeply striate throughout.
 a^6 . Suture strongly depressed Species 9.
 b^6 . Suture feebly depressed Species 10.
 d^5 . Elytra finely striate throughout.
 c^6 . Rostrum longer: length of body $3-4\frac{1}{2}$ mm. Species 11, 12.
 d^6 . Rostrum very short: length of body 2 mm. Species 13.
 e^5 . Elytra with the three inner striae only distinct.
 e^6 . Body wholly black Species 14.
 f^6 . Body black, the elytra with a rufous humeral patch Species 15.
 f^5 . Elytra with the two inner striae only distinct; prothorax unimpressed at base Species 16.
 g^5 . Elytra with the sutural stria only distinct (the others more or less traceable in *D. nigripes*); prothorax unimpressed at base: length less than 3 mm.
 g^6 . Body wholly black (the prothorax reddish in *D. bistriatus*) Species 17, 18.
 h^6 . Body black, rufous above Species 19.
 i^6 . Body rufous, the legs and antennae black Species 20.
 b^2 . Anterior femora strongly dilated at the base; elytra finely striate; body rufescent above Species 21.
 b^1 . All the tibiae rounded near the base externally; elytra with the sutural stria only distinct Species 22.
 b . Anterior femora feebly denticulate, the anterior tibiae also finely denticulate externally towards the apex, all the tibiae angulate near the base; prothorax canaliculate; elytra striate: length of body $2\frac{1}{2}$ mm. Species 23.
 c . Intermediate and posterior femora finely denticulate, all the tibiae angulate near the base externally; elytra striate: length of body $2\frac{1}{10}-2\frac{1}{2}$ mm. Species 24, 25.

* Exclusive of the marginal striae, which are not visible from above.

1. *Diorymerus serripes*, sp. n. (Tab. XII. figg. 11, 11 *a*, ♀; 11 *b*, ant. tibia.)

Subrhomboidal, convex, shining, black, the punctures of the under surface and legs each bearing a minute scale, the tibiae with long fine hairs on their inner edge. Head sparsely, minutely punctate, with a distinct transverse frontal groove; rostrum stout, moderately long, thickly punctate, longer and smoother in the ♀, the antennae inserted behind the middle, the club acuminate-ovate. Prothorax smooth or faintly punctate, with some larger punctures along the basal margin and on the short anterior lobe, the base slightly depressed on each side of the median lobe. Scutellum transverse. Elytra subtriangular, depressed along the suture anteriorly, deeply striate throughout, the striae feebly punctate, the interstices smooth. Pro-, meso- and metapleura coarsely, sparsely punctate. Ventral segments very sparsely punctate, 1 deeply excavate in the middle in the ♂. Legs stout; femora shallowly sulcate beneath, unarmed; tibiae broad, sharply denticulate along their inner edge, the intermediate and posterior pairs angularly dilated externally near the base and straight thence to the apex.

Length $3\frac{3}{4}$ –4, breadth $2\frac{1}{2}$ – $2\frac{4}{5}$ millim. (♂ ♀.)

Hab. GUATEMALA, Zapote (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Five specimens, all but one from Panama. Easily known by the sharply denticulate inner edge of the tibiae (the last tooth being about as long as the apical uncus) and the very distinctly striate elytra. *D. tibialis*, Boh., from Brazil, must be an allied form.

2. *Diorymerus denticulatus*, sp. n. (Tab. XII. figg. 12, 12 *a*; 12 *b*, ant. tibia.)

Glebose-ovate, shining, black, almost glabrous. Head minutely punctate, with a distinct transverse frontal groove; rostrum very stout, about as long as the head and prothorax, sparsely punctate, the antennae inserted near the middle, the club ovate. Prothorax smooth, sometimes with scattered coarse punctures at the sides and along the anterior constriction, the base slightly depressed on each side of the median lobe. Scutellum transverse. Elytra rapidly narrowing from the rounded humeri, the sides forming an almost continuous outline with those of the prothorax; finely striate near the suture, the other striae obliterated (except at the base), the inner striae with scattered punctures. Mesosternal side-pieces with a few scattered very coarse punctures. First ventral segment broadly depressed down the middle in the ♂. Femora deeply sulcate beneath, unarmed. Tibiae broad, finely and more or less distinctly denticulate along their inner edge (usually with a longer tooth near the apex), the anterior pair angularly, and the others acutely, dilated on their outer edge near the base, the anterior pair also dilated at the apex externally.

Length 3–4, breadth $2\frac{1}{8}$ – $2\frac{9}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente, Toxpan, Juquila (*Sallé*), Oaxaca (*Höge*); BRITISH HONDURAS, Rio Hondo (*Blancaneaux*); GUATEMALA, San Juan, Teleman San Gerónimo, Zapote (*Champion*); COSTA RICA, Azahar de Cartago (*Underwood*); PANAMA, Volcan de Chiriqui, Bugaba, Caldera, Taboga I. (*Champion*).

A common insect in Central America, differing from *D. serripes* in its more globose form, shorter and stouter rostrum, obsoletely striate elytra, deeply sulcate femora, and more finely denticulate tibiae. This last-mentioned character is somewhat variable, but one or more teeth are always present towards the apex of the tibia, in addition to the claw. The elytral striae are sometimes scarcely traceable, except towards the base and suture.

3. *Diorymerus perlævis*, sp. n. (Tab. XII. figg. 13, 13 *a*; 13 *b*, ant. tibia.)

Short ovate, very convex, shining, black. Head almost smooth, transversely depressed and faintly foveate between the eyes; rostrum short, exceedingly stout, strongly arcuate, sparsely punctate. Prothorax smooth, depressed at the base on each side of the median lobe. Scutellum short, transverse, flat. Elytra with a shallow sutural and two distinct marginal striæ, these striæ with fine scattered punctures, the others obliterated. Beneath with a few scattered punctures. Legs sparsely punctate; femora sulcate and unarmed beneath; intermediate and posterior tibiæ almost straight, angularly dilated near the base externally; anterior tibiæ sinuous, obsoletely denticulate along their inner edge.

Length $2\frac{2}{3}$, breadth $1\frac{2}{3}$ millim. (σ ?)

Hab. MEXICO, Teapa in Tabasco (*H. H. Smith*).

One specimen. Shorter and smaller than *D. lævissimus*, the scutellum transverse, the sutural and marginal striæ of the elytra less distinct, the anterior tibiæ obsoletely denticulate within, the other tibiæ angulate at the base externally.

4. *Diorymerus lævipes*, sp. n. (Tab. XII. figg. 14, 14 *a*, σ ; 14 *b*, ant. tibia.)

Globose-ovate, shining, black. Head smooth, unimpressed; rostrum short, curved, striate and faintly punctate at the base, almost smooth in the φ ; antennal club nearly as long as the funiculus. Prothorax depressed at the base on each side of the median lobe, feebly constricted in front, smooth; the disc feebly nodose on each side, and the intervening space broadly flattened, in the σ . Scutellum transverse. Elytra with rows of scattered minute punctures, striate at the base and near the suture, the sutural stria more coarsely punctate towards the base. Beneath very sparsely punctate, the meso- and metasternal side-pieces smooth; metasternum and first ventral segment broadly excavate down the middle in the σ . Femora and tibiæ with a few minute scattered punctures; femora deeply sulcate and unarmed beneath, the anterior pair widened at the base; tibiæ broad, hollowed for the reception of the tarsi in repose, unarmed within, the anterior pair angularly dilated on the outer edge near the base and also near the apex (the median third widened), the intermediate and posterior pairs more or less angulate near the base externally.

Length $4\frac{1}{2}$ – $5\frac{1}{2}$, breadth $3\frac{1}{2}$ –4 millim. (σ φ .)

Hab. NICARAGUA, Chontales (*Belt, Janson*: σ φ); PANAMA, Volcan de Chiriqui (*Champion*: σ).

Four specimens, the one from Chiriqui (a σ) much larger than the others and with a distinct rounded prominence on each side of the flattened space on the disc of the prothorax. The femora are almost smooth, and the anterior tibiæ are dilated on their outer edge for rather more than the median third. The Chiriqui example is figured.

5. *Diorymerus læviusculus*, sp. n.

Globose-ovate, shining, black, the upper surface with a faint brassy lustre. Head very sparsely, minutely punctate, obsoletely foveate in front, without transverse frontal groove; rostrum short, curved, moderately stout, very sparsely punctate, smoother in the φ . Prothorax depressed at the base on each side of the median lobe, almost smooth. Scutellum transverse. Elytra with rows of minute scattered punctures, which become coarser at the base and along the impressed sutural stria. Beneath very sparsely, coarsely punctate, the ventral segments 2–4 and the sides of the metasternum with a few scattered fine punctures only; metasternum and first ventral segment broadly excavate down the middle in the σ . Femora sparsely punctate, deeply sulcate and unarmed beneath; the anterior pair widened at the base. Tibiæ broad, unarmed on their inner edge, dentate externally near the base, the tooth on the posterior pair long and curved inwards, the anterior pair also dentate near the apex and narrowed thence to the tip.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth $2\frac{2}{5}$ – $3\frac{2}{5}$ millim. (σ φ .)

Hab. MEXICO, Atoyac in Vera Cruz, Teapa (*H. H. Smith*); GUATEMALA, Coban (*Conradt*), Panima and San Juan in Vera Paz (*Champion*).

Seven specimens. Extremely like *D. fossulatus*, but wanting the deep transverse frontal sulcus; the rostrum not so stout, smoother, and a little longer; the under surface and the femora more sparsely punctate; the anterior tibiae dentate externally towards the apex, as well as near the base. The legs are not so smooth as in *D. laevipes*, and the tibiae are more sharply toothed near the base externally; the prothorax, moreover, is not flattened across the disc in the male.

6. *Diorymerus erythropterus*, sp. n. (Tab. XII. figg. 15, 15 a.)

Subrhomboidal, very convex, shining, black, the elytra rufo-testaceous. Head somewhat closely punctate, shallowly, transversely depressed in front; rostrum short, moderately stout, closely punctate; antennal club as long as the funiculus. Prothorax smooth, the base and apex with a few punctures, the base slightly depressed on each side of the median lobe. Scutellum subquadrate. Elytra subtriangular, slightly depressed along the suture, the humeri rounded and rather prominent; with rows of extremely minute scattered punctures (the position of each of which is indicated by seriate coarse impressions showing through from beneath), the sutural and marginal striae only well-defined, the others obliterated. Beneath with very coarse scattered punctures, the ventral segments 2-5 much smoother, 1 broadly depressed in the middle. Femora coarsely punctate, deeply sulcate and unarmed beneath. Tibiae broad, unarmed within, all angularly dilated on the outer edge near the base, the anterior pair also angulate near the apex.

Length $3\frac{3}{5}$, breadth $2\frac{1}{2}$ millim. (σ .)

Hab. GUATEMALA, near the city 500 feet (*Salvin*).

One specimen. The only Central-American species known as yet with the elytra rufo-testaceous and the rest of the body black. The elytra are almost smooth on the surface (though there are rows of coarse punctures showing through from beneath), the sutural stria, however, is deeply impressed.

7. *Diorymerus fossulatus*, sp. n. (Tab. XII. figg. 16, 16 a, b.)

Globose-ovate, shining, black, the upper surface with a distinct brassy lustre, the anterior tibiae fringed with short ochreous hairs at the tip. Head minutely punctate, with a very deep transverse frontal groove; rostrum stout, curved, short, about as long as the lateral portion of the prothorax, thickly punctate; antennae short, with a stout, ovate club. Prothorax depressed at the base on each side of the median lobe, almost smooth, the anterior lobe finely punctate, the lower part of the flanks, and the lateral portions of the meso- and metasternum also, with very coarse scattered punctures. Scutellum very small. Elytra with rows of minute scattered punctures, striate at the extreme base and along the suture and lower margin, the sutural stria with elongate, contiguous impressions. Intercostal portion of the meso- and metasternum, and ventral segments 1 and 5, densely and coarsely, and ventral segments 2-4 sparsely, punctate. Femora coarsely, closely punctate, deeply sulcate and unarmed beneath. Tibiae broad, unarmed on their inner edge, dentate externally near the base, the tooth on the posterior pair long and curved inwards, the anterior pair hollowed and shallowly sulcate on their outer face.

Length $3\frac{1}{2}$ -4, breadth $2\frac{1}{2}$ -3 millim.

Hab. GUATEMALA, El Jicaro in Vera Paz (*Champion*).

Six specimens. Recognizable amongst the allied species with obliterated dorsal striae by the very deep transverse frontal excavation, and the short, stout, thickly punctate rostrum. The sutural stria is catenulate-punctate; the first ventral segment is densely punctured; and the anterior tibiae are shallowly sulcate for the reception of the tarsi in repose.

8. *Diorymerus punctatus*, sp. n. (Tab. XII. figg. 17, 17 a.)

Ovate, shining, black, obscure castaneous above. Head closely punctate, foveate between the eyes; rostrum curved, rather slender, a little longer than the prothorax, thickly punctate, the antennæ inserted at about the basal third. Prothorax closely punctate, except along a narrow space down the middle, the base slightly depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra sharply striate throughout, the striæ with scattered fine punctures, the interstices sparsely, very distinctly punctate, the suture somewhat depressed. Beneath, the ventral segments 2-4 excepted, closely, coarsely punctate, the punctures on the flanks large and rounded. Legs short, stout, closely punctate; femora sulcate and unarmed beneath; anterior tibiæ dentate on the outer edge near the apex; intermediate and posterior tibiæ broadly dilated and acutely dentate near the base externally.

Length 3, breadth 2 millim. (♂ ?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Distinguishable from the other small allied forms by the closely punctured prothorax and the distinctly punctate elytral interstices. The anterior tibiæ are dentate near the apex externally, and the others are broadly dilated and have an inwardly-curved tooth on the outer edge near the base.

9. *Diorymerus latus*, sp. n. (Tab. XII. figg. 18, 18 a.)

Short, broad, subrhomboidal, shining, black. Head closely punctate, unimpressed in front; rostrum short, moderately stout, feebly curved, slightly thickened towards the base, longitudinally rugulose. Prothorax punctured along the basal margin only, the base depressed on each side of the median lobe. Scutellum closely punctate, trapezoidal. Elytra subtriangular, strongly depressed along the suture to the apex, sharply striate, the striæ feebly punctate, the humeri smooth. Beneath (the ventral segments 2-4 excepted) coarsely punctate. Metasternum broadly and deeply excavate posteriorly. Legs short and stout; femora coarsely punctate, sulcate and unarmed beneath; tibiæ broad, the intermediate and posterior pairs hollowed on the inner side towards the apex and dentate externally near the base, the anterior pair angulate on the outer edge near the base.

Length $3\frac{1}{2}$, breadth $2\frac{4}{5}$ millim. (♂ ?)

Hab. MEXICO, Sierra de Durango (*Speyer, in coll. Solari*).

A single specimen, in Signor A. Solari's collection. A short, broad, robust form, with deeply striate elytra, the suture strongly depressed, the rostrum short, the head closely punctate, &c. *D. latus* is shorter and broader than *D. serripes* and the tibiæ are not denticulate on their inner edge.

10. *Diorymerus exaratus*, sp. n. (Tab. XII. figg. 19, 19 a.)

Ovate, shining, black. Head finely punctate, transversely depressed between the eyes; rostrum very stout, short, abruptly curved downward at the base, thickly punctate. Prothorax with the sides forming a continuous outline with those of the elytra, strongly constricted in front, almost smooth, the base depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra triangular, produced at the apex, deeply striate throughout, the striæ feebly punctate, the interstices smooth, the suture slightly depressed. Beneath sparsely punctate. Femora sulcate and unarmed beneath. Tibiæ almost straight, each sharply angulate near the base externally.

Length $2\frac{1}{2}$, breadth $1\frac{3}{5}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. The deeply striate elytra, the simply sulcate femora, and the sharply angulate tibiæ separate this small species from most of its allies.

11. *Diorymerus ovatus*, sp. n. (Tab. XII. figg. 20, 20 a.)

Globose-ovate, shining, black. Head somewhat closely punctate, with a shallow transverse frontal depression; rostrum short, stout, strongly arcuate, closely punctate, a little smoother in the ♀. Prothorax smooth, the anterior lobe and the produced basal portion finely punctate, the base slightly depressed on each side of the median lobe. Scutellum oblong-subquadrate. Elytra finely striate, the striæ becoming deeper at the base and near the suture, all conspicuously punctate. Beneath, the propleura included, coarsely punctate, the ventral segments 2-4 much smoother, 1 densely punctate, slightly depressed down the middle in the ♂. Femora coarsely punctate, deeply sulcate and unarmed beneath. Intermediate and posterior tibiæ broad, straight, angularly dilated externally near the base; anterior tibiæ narrower, curved outwards, subangularly dilated near the base.

Length $3\frac{9}{10}$ - $4\frac{1}{2}$, breadth $2\frac{2}{3}$ - $3\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente, Toxpan (Sallé), Cordova (Höge), Teapa (H. H. Smith); GUATEMALA, Cubilguitz, Chacoj, Capetillo (Champion); COSTA RICA, Alajuela (Orosco, in *Mus. Brit.*).

Ten specimens. The chief characters of this species are its convex, regularly globose-ovate form, distinctly punctate-striate elytra, and oblong scutellum. *D. ovatus* is not unlike *Rhianus mexicanus*, Pasc., but it is smaller and has the femora more deeply sulcate beneath. The elytra are much more distinctly punctate-striate than in *D. laeviusculus*.

12. *Diorymerus cribrarius*, sp. n. (Tab. XII. figg. 21, 21 a.)

Ovate, shining, black. Head finely punctate, foveate in the middle above the eyes and flattened between them; rostrum short and stout, thickly punctate. Prothorax very finely, sparsely punctate (except along a narrow smooth space down the middle), the punctures becoming a little coarser along the basal margin, the flanks closely set with large, coarse, rounded impressions, the base unimpressed. Scutellum small, subquadrate. Elytra depressed along the suture, finely striate, the striæ feebly punctate, becoming deeper towards the suture and almost obsolete on the outer part of the disc, the marginal striæ catenulate-punctate. Beneath, the flanks included, very coarsely, closely punctate, the ventral segments 3 and 4 and the base of 5 almost smooth. Legs short and stout, closely punctate; femora deeply sulcate and unarmed beneath; tibiæ straight, the anterior pair feebly, the others more strongly, angulate near the base externally.

Length $3-3\frac{1}{10}$, breadth $2-2\frac{1}{10}$ millim.

Hab. PANAMA, Bugaba (Champion).

Three specimens. The extremely coarse punctuation of the pro-, meso-, and metapleura (coarser than in *D. ovatus*), the distinct frontal impression, the unimpressed base of the prothorax, and the straight tibiæ, separate *D. cribrarius* from most of its allies.

13. *Diorymerus laticrus*, sp. n. (Tab. XII. figg. 22, 22 a.)

Short ovate, very convex, black, shining. Head finely punctate, not depressed between the eyes; rostrum very short, stout, punctulate and longitudinally strigose. Prothorax conical, with excessively minute scattered punctures, those on the anterior lobe and the produced basal portion coarser. Scutellum flat, subquadrate. Elytra finely striate, the striæ with small scattered punctures, becoming deeper towards the suture and almost obsolete towards the sides. Pro-, meso-, and metapleura with very coarse scattered punctures, the first ventral segment coarsely, and rest of the under surface much more.

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finely, punctate. Legs stout, finely punctate; femora sulcate and unarmed beneath; tibiæ broad, the intermediate and posterior pairs angulate externally near the base.
Length 2, breadth $1\frac{1}{3}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

One specimen. One of the smallest of the Central-American forms, and distinguishable by the very short, stout rostrum, the finely striate elytra, and the broad tibiæ, the intermediate and posterior pairs only angulate. The prothorax is unimpressed at the base, and the elytra are not depressed along the suture.

14. *Diorymerus sexstriatus*, sp. n.

Ovate, black, shining. Head sparsely, finely punctate, transversely depressed between the eyes; rostrum very stout, short, closely punctate in the ♂, smoother in the ♀. Prothorax smooth, the median lobe only with a few fine punctures, the base depressed on each side of it. Scutellum small, oblong. Elytra depressed along the suture, each with the three inner striæ deep, and the others (the two marginal ones excepted) very faint or almost obsolete, these latter with scattered fine punctures. Beneath closely punctate, the flanks of the prothorax almost impunctate. Legs closely punctate; femora sulcate and unarmed beneath; tibiæ almost straight, the intermediate and posterior pairs subangulate near the base externally.

Length $3\frac{1}{2}$ – $3\frac{3}{4}$, breadth 2 – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, Chacoj and San Juan in Vera Paz (*Champion*: ♂ ♀); PANAMA, Bugaba (*Champion*: ♀).

One specimen from each locality. Very like *D. cribrarius*, but with the prothorax almost impunctate on the disc and flanks and the base depressed on each side of the median lobe, the three inner striæ of the elytra deep and without definite punctures, the intermediate and posterior tibiæ less acutely dilated near the base, the ventral segments 3 and 4 distinctly punctate.

15. *Diorymerus ornatus*, sp. n. (Tab. XII. fig. 23.)

Ovate, shining, black, the elytra with a large rufous humeral patch. Head sparsely punctate, transversely depressed in front; rostrum short, arcuate, moderately stout, sparsely punctate, striate at the sides. Prothorax slightly depressed at the base on each side of the median lobe, smooth, the median lobe only with a few rather coarse punctures. Scutellum transverse. Elytra depressed along the suture, the first three striæ and the marginal one well-defined (the sutural stria deep), the others almost obliterated, except at the base and apex, the striæ with minute distantly-placed punctures. Beneath sparsely punctate. Femora rather coarsely punctate, sulcate and unarmed beneath. Tibiæ broad, unarmed within, all dentate on the outer edge near the base, the anterior pair also angulate near the tip.

Length 3, breadth 2 millim. (♂?)

Hab. MEXICO (*Dupont, in Mus. Brit.*).

One specimen. The large rufous humeral patch and the almost smooth outer portion of the dorsal surface of the elytra sufficiently distinguish *D. ornatus*. The minute, scattered, seriate punctures are conspicuous on the rufous portion of the surface, showing through from beneath. The anterior tibiæ are angulate externally near the base and apex.

16. *Diorymerus quadristriatus*, sp. n. (Tab. XII. fig. 24.)

Subovate, shining, black. Head very minutely punctate, transversely depressed between the eyes; rostrum short, exceedingly stout, strongly arcuate, finely punctate. Prothorax with excessively minute scattered punctures, those on the anterior lobe more distinct, the base unimpressed. Scutellum small, transverse. Elytra slightly depressed along the suture, the first and second striae sharply defined, the others (the two marginal ones excepted) fine or obsolete, the inner and outer striae faintly punctate. Beneath coarsely (the sides sparsely) punctate, the ventral segments 2-5 much smoother. Legs short and stout; femora closely punctate, sulcate and unarmed beneath; tibiae straight, each sharply angulate externally near the base.

Length $1\frac{7}{8}$ -2, breadth $1\frac{1}{10}$ - $1\frac{1}{5}$ millim.

Hab. GUATEMALA, Zapote (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Three specimens. A minute form, with the two inner striae of the elytra sharply defined and the others (the marginal ones excepted) faint or obsolete, the rostrum short and exceedingly stout, and all the tibiae sharply angulate externally.

17. *Diorymerus bistriatus*, sp. n.

Ovate, shining, black, the prothorax rufo-piceous. Head sparsely, very minutely punctate, transversely depressed between the eyes; rostrum short, stout, strongly arcuate, finely punctate and striolate. Prothorax smooth. Scutellum small, subquadrate. Elytra depressed along the suture, with a sharply-defined sutural stria only, the others (the marginal ones excepted) obliterated. Beneath (the ventral segments 2-5 excepted) coarsely punctate, the propleura in great part smooth. Legs short and stout, closely punctate; femora sulcate and unarmed beneath; anterior tibiae sinuous, the others straight, all sharply angulate near the base externally.

Length $2\frac{1}{3}$, breadth $1\frac{1}{2}$ millim. (σ ?)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. Broader than *D. longirostris*, the rostrum short and stout, the elytra wider below the base and depressed along the suture, the legs stouter, the anterior tibiae not so straight. Narrower than *D. perlævis*, the rostrum shorter and not so stout, the prothorax unimpressed at the base, the elytra not depressed along the suture and with a sharply-defined sutural stria, the tibiae all sharply angulate externally.

18. *Diorymerus longirostris*, sp. n. (Tab. XII. figg. 25, 25 a.)

Ovate, narrow, very convex, shining, black. Head finely punctate, transversely depressed between the eyes; rostrum comparatively slender, longer than the prothorax, abruptly bent downward near the base, finely punctate, smoother beyond the middle, the antennae inserted at about the basal third. Prothorax almost smooth, feebly constricted in front, unimpressed at the base. Scutellum small, oblong-subquadrate. Elytra with a sharply-defined sutural stria only, the others (the marginal one excepted) obliterated, the humeri not prominent and forming a continuous outline with the sides of the prothorax. Propleura smooth, the meso- and metapleura, and first ventral segment, very coarsely punctate. Femora finely punctate, sulcate and unarmed beneath. Tibiae almost straight, all sharply angulate near the base externally.

Length $2\frac{1}{10}$, breadth $1\frac{1}{3}$ millim. (φ .)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. A minute, narrow, very convex, smooth form, with the sutural stria only of the elytra visible, the rostrum comparatively long and slender, and abruptly bent downward near the base, and all the tibiae sharply angulate externally. *D. longirostris* is relatively narrower than any of the other Central-American members of the genus.

19. *Diorymerus rubricatus*, sp. n. (Tab. XII. figg. 26, 26 a.)

Ovate, very convex, shining, black, rufous above, the median portion of the head and the tip of the rostrum more or less rufescent. Head with a few minute punctures, shallowly foveate or transversely depressed between the eyes; rostrum arcuate, very stout, short, finely punctate, the antennae inserted at about the middle. Prothorax smooth. Scutellum very small. Elytra smooth, with a distinct sutural stria only, the others obsolete or barely traceable. Beneath sparsely, coarsely punctate, the ventral segments 3 and 4 smoother. Femora finely punctate, sulcate and unarmed beneath. Tibiae almost straight, each acutely dilated near the base externally.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim.

Hab. PANAMA, San Miguel in the Pearl Is. (*Champion*).

Two specimens. Shorter and more ovate than *D. nigripes*, the elytra with a single (sutural) stria only, the rostrum short and stout, the tibiae more acutely dilated near the base, the body black beneath. Allied forms occur in South America.

20. *Diorymerus nigripes*, sp. n. (Tab. XII. figg. 27, 27 a.)

Rhomboidal, narrow, very shining, rufous, the antennae, eyes, and legs nigre-piceous. Head sparsely punctate, transversely depressed between the eyes; rostrum curved, a little longer than the prothorax, slender, sparsely punctate, the apical portion smoother and flattened, the antennae inserted behind the middle. Prothorax rapidly narrowing from the base, smooth. Scutellum very small, subquadrate. Elytra triangular, finely striate, the striae faintly punctate, becoming deeper towards the suture and obsolete towards the sides, the sutural stria sharply defined. Beneath coarsely, sparsely punctate, the ventral segments 2-5 smoother. Legs rather slender, sparsely punctate; femora sulcate and unarmed beneath; tibiae straight, each angularly dilated externally at the base.

Length $2\frac{9}{10}$, breadth $1\frac{2}{3}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. A small, narrow, very shining, rufescent form, with blackish legs and antennae, the tibiae straight, and each angularly dilated on the outer edge near the base. The sutural stria is deep, the others very fine or obsolete.

21. *Diorymerus erythronotus*, sp. n. (Tab. XII. figg. 28, 28 a, ♂; 28 b, anterior leg.)

Subrhomboidal, shining, black, rufous above. Head finely punctate, convex; rostrum shorter than the prothorax, feebly curved, moderately stout, dull, and rugulosely punctate to the tip in the ♂, the apical portion much more slender, shining, and sparsely punctate in the ♀, the antennae inserted towards the base. Prothorax with minute scattered punctures, which become coarser and closer on the anterior lobe and along the basal margin, the base depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra subtriangular, finely, sharply striate, the sutural stria deeper, the striae feebly punctate, the interstices each with minute scattered punctures along the middle, the suture slightly

depressed. Beneath (the ventral segments 3 and 4 excepted) coarsely punctate, the punctures on the pro- and mesopleura large and rounded. Legs stout, closely punctate; femora deeply sulcate and unarmed beneath, the anterior pair strongly dilated at the base; intermediate and posterior tibiae dentate and broadly dilated externally near the base, and narrowing thence to the apex, the anterior tibiae hollowed on the inner edge near the apex and somewhat curved externally.

Length $2\frac{1}{2}$ – $3\frac{2}{3}$, breadth $1\frac{1}{2}$ – $2\frac{1}{4}$ millim. (σ φ .)

Hab. MEXICO, Frontera in Tabasco (*Höge*); BRITISH HONDURAS (*Blancaneaux*); GUATEMALA, Teleman in Vera Paz (*Champion*).

Six specimens. Easily recognizable by the rufescent upper surface, the dilated intermediate and posterior tibiae (which are also each armed with a stout, inwardly-curved, dentiform projection near the base), and the basally widened anterior femora.

22. *Diorymerus lævissimus*, sp. n.

Ovate, shining, black. Head smooth, transversely depressed in front; rostrum stout, strongly arcuate, sparsely punctate, rugulose along the sides; joint 7 of the funiculus strongly transverse and forming part of the club. Prothorax smooth, feebly constricted in front. Scutellum small, oblong-subquadrate. Elytra with the sutural and marginal striae only present, the others obliterated, except at the base, the marginal striae shallowly catenulate-punctate. First ventral segment closely punctate, unimpressed, the rest of the under surface with a few widely scattered punctures. Femora sparsely punctate, sulcate and unarmed beneath. Tibiae straight, rather narrow, unarmed within and rounded at the base externally.

Length 3, breadth 2 millim. (φ ?)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. A very smooth form, with the sutural and marginal striae of the elytra alone visible, the marginal striae catenulate-punctate, the scutellum oblong, the legs rather slender, the tibiae straight and not angulate externally near the base.

23. *Diorymerus canaliculatus*, sp. n. (Tab. XII. figg. 29, 29 *a*; 29 *b*, anterior leg.)

Ovate, black, shining. Head with a few minute scattered punctures, transversely depressed between the eyes; rostrum stout, fully as long as the prothorax, sparsely, finely punctate. Prothorax very sparsely, minutely punctate, canaliculate down the middle, the base slightly depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra finely striate, the striae feebly punctate, becoming deeper towards the suture and almost obsolete on the outer part of the disc. Beneath, the flanks of the prothorax included, coarsely, sparsely punctate, the ventral segments more finely punctured. Legs closely punctate; femora sulcate beneath, the anterior pair feebly denticulate along the edges of the sulcus; tibiae almost straight, the anterior pair finely denticulate along their outer edge, the others subangulate near the base externally.

Length $2\frac{1}{2}$, breadth $1\frac{2}{3}$ millim. (φ ?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. Near *D. serrulatus*, the anterior (instead of the intermediate and posterior) femora feebly denticulate beneath, the anterior tibiae also denticulate along their outer edge (not sharply angulate at the base), the prothorax canaliculate, the elytra scarcely depressed along the suture.

24. *Diorymerus serrulatus*, sp. n. (Tab. XII. figg. 30, 30 *a*; 30 *b*, intermediate leg.)

Ovate, shining, black, the elytra sometimes rufo-piceous towards the sides. Head with a few minute punctures, transversely depressed between the eyes; rostrum exceedingly stout, short, closely punctate. Prothorax with a few very minute scattered punctures, and a line of coarser impressions along the basal margin, the base depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra depressed along the suture, the inner striae deep, the others (the marginal ones excepted) faint or almost obsolete, all distinctly punctate. Beneath, the flanks of the prothorax included, sparsely, coarsely punctate. Legs short, closely punctate; femora sulcate beneath, the intermediate and posterior pairs finely denticulate along the edges of the sulcus; tibiae almost straight, all sharply angulate near the base externally.

Length $2\frac{1}{10}$ – $2\frac{1}{2}$, breadth $1\frac{2}{5}$ – $1\frac{3}{5}$ millim.

Hab. MEXICO, Teapa (*H. H. Smith*), Tapachula (*Höge*); GUATEMALA, San Juan in Vera Paz (*Champion*); NICARAGUA, Chontales (*Janson*).

Eleven specimens, the two from Chontales having the dorsal striae of the elytra (the first excepted) only just traceable. Differs from all the small allied forms in the finely denticulate lower outer edge of the intermediate and posterior femora. The prothorax has a very distinct row of punctures along the basal margin, and all the tibiae are sharply angulate externally.

25. *Diorymerus sulcatus*, sp. n. (Tab. XII. figg. 31; 31 *a*, hind leg.)

Ovate, shining, black, the tarsi, tip of the rostrum, and antennae (the club excepted) more or less ferruginous. Head with a few minute punctures, transversely depressed between the eyes; rostrum arcuate, stout, as long as the prothorax, sparsely punctate. Prothorax rounded at the sides (which do not form a continuous outline with the sides of the elytra), strongly constricted in front, almost smooth, the base depressed on each side of the median lobe. Scutellum small, subquadrate. Elytra depressed along the suture, deeply striate throughout, the striae feebly punctate, the interstices smooth. Beneath very sparsely punctate. Legs comparatively slender, sparsely punctate; femora sulcate beneath, the intermediate and posterior pairs with the edges of the sulcus finely denticulate; tibiae almost straight, each angulate near the base externally, the anterior pair somewhat elongated.

Length $2\frac{1}{5}$, breadth $1\frac{1}{2}$ millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Very like *D. exaratus* (of which it would at first sight appear to be the female), but with the rostrum more slender and regularly arcuate, the prothorax with the sides somewhat converging at the base, the elytra shorter and depressed along the suture, the intermediate and posterior femora finely denticulate beneath, the tibiae less acutely angulate externally.

Sect. CENTRINIDES*.

Centrinides, Lacordaire.

DIASTETHUS.

Diastethus, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 323, 327 (1889).

Pascoe gives *Centrinus tumidus*, Boh., as the type of this genus, which will also have to include a large number of Central- and S.-American forms, such as *C. parcellinus*, *cyanipes*, *mexicanus*, *falcatus*, *ater*, Boh., &c. Some of them are metallic (resembling *Eurhinus* and certain forms referred to *Cylindrocerus* by Schönherr), others black, castaneous, or ferruginous. The non-metallic species have the facies of a *Diorymerus*, but differ from that genus in the imperfectly sulcate, toothed femora, the less excavate pro-, meso-, and metasternum, &c. In well-developed males of *D. aztecus* and *D. ater* the prosternum is not only armed with two spines, but has a deep, circular cavity between them (as in Pascoe's genus *Camelodes*); no importance, however, can be attached to this character, as the spines and cavity are sometimes wholly wanting in individuals of minor development of the same species. The various forms referred to *Diastethus* agree in the following characters:—

Mandibles almost straight on their inner edge, sometimes toothed on their outer edge beneath; rostrum more or less elongate, strongly arcuate; antennal club ovate or oblong-ovate, with distinct sutures; prothorax narrow and tubulate in front, bisinuate at the base, often gibbous on the disc, without ocular lobes; scutellum transverse; elytra more or less triangular; pygidium hidden; anterior coxæ moderately distant; prosternum more or less sulcate down the middle, in the ♂ sometimes armed with two spines or tubercles, and with a circular excavation between them; metasternum binodose or not in front; femora dentate and more or less sulcate towards the apex beneath; tarsal claws approximate or subconnate at the base; body rhomboidal or subrhomboidal, polished or alutaceous, glabrous above, the scutellum sometimes squamose.

- a. Metasternum binodose and rather prominent in front; femora bidentate; intermediate tibiæ with a long spine on outer edge; prosternal sulcus shallow: body metallic, polished, the under surface with dense patches of whitish scales Species 1.
- b. Metasternum flattened, not prominent in front.
 - a¹. Mandibles without tooth at the sides beneath.
 - a². All the femora uni- or bidentate.
 - a³. Tibiæ rounded at the base externally.
 - a⁴. Body metallic, polished, the under surface with dense patches of whitish scales Species 2.
 - b⁴. Body metallic, finely alutaceous, the under surface without patches of scales Species 3.

* The whole of the members of this section have not yet been studied by me, and the term is only used here for convenience of arrangement. The Centrinides, however, it may be noted, probably include nearly all the Barids armed with prosternal spines in the male; but this character, unfortunately, cannot always be relied upon, as the spines vary in development in the same species, and are sometimes wanting. The scutellum, too, is free and the pygidium (with rare exceptions) covered in both sexes.

- c*⁴. Body not metallic, polished.
- a*⁵. Legs smooth; elytra with convex interstices and very prominent humeri; prosternum bituberculate in ♂: body rufo-testaceous, glabrous Species 4.
- b*⁵. Legs punctured; elytra with flattened interstices and non-prominent humeri: body black, castaneous, or ferruginous, the prothorax and elytra sometimes wholly or in part rufous.
- a*⁶. Scutellum squamose on each side; uncus of the anterior and intermediate tibiæ dilated in ♂ Species 5.
- b*⁶. Scutellum glabrous; uncus of the tibiæ normally formed.
- a*⁷. Elytra without transverse depressions on the disc*.
- a*⁸. Prothorax regularly convex on the disc.
- a*⁹. Body wholly black; prosternum sometimes bispinose in ♂ Species 6-11.
- b*⁹. Body black, the prothorax rufous; prosternum unarmed in ♂ Species 12-14.
- b*¹⁰. Prothorax gibbous on the disc.
- c*¹. Tarsi narrow; rostrum shorter and stouter; prosternum bispinose, and often with a large deep circular cavity, in ♂ Species 15.
- d*¹. Tarsi broader; rostrum very long and slender; prosternum obsoletely bituberculate in ♂ Species 16.
- b*⁷. Elytra with one or two transverse depressions on the disc; prothorax regularly convex; prosternum bituberculate or unarmed in ♂ Species 17-19.
- b*¹. Tibiæ subangulate at the base externally; prothorax regularly convex: prothorax and a large humeral patch on the elytra rufescent Species 20.
- b*². Anterior femora unarmed, the others unidentate; prothorax gibbous on the disc.
- c*¹. Elytra with transverse depressions: body castaneous or rufous Species 21.
- d*¹. Elytra without transverse depressions: each elytron with a large rufescent humeral patch Species 22.
- b*¹. Mandibles with a sharp tooth at the sides beneath; femora with two or more small teeth; prothorax regularly convex; prosternum unarmed in ♂: elytra wholly or in part rufous or rufo-testaceous Species 23-25.

1. **Diastethus eurhinoides**, sp. n. (Tab. XIII. figg. 1, 1 *a*, ♀; 1 *b*, intermediate tibia.)

Rhomboidal, broad, shining, blue, the scutellum, rostrum, legs, and under surface more or less green; glabrous above, the prosternum, the sides of the metasternum, and the first two ventral segments in part, densely clothed with narrow whitish scales. Rostrum long, rather slender, thickened, abruptly bent, and punctate at the base, the antennæ inserted at about the basal fifth, the club ovate. Prothorax very broad, transversely convex, arcuato-explanate at the sides, with minute widely-scattered punctures, those on the median lobe coarse, the oblique basal foveæ rather deep. Scutellum very broad, short. Elytra broad, triangular, the suture slightly depressed anteriorly; sharply and finely striate throughout, the inner striæ faintly, the others distinctly, punctate, the interstices flat. Beneath closely punctate,

* Except in no. 16 (*D. gracilirostris*).

the punctuation denser and very fine on the squamose portions of the surface; prosternal sulcus very shallow; metasternum binodose in front. Femora sharply dentate, the intermediate and posterior pairs also with a minute additional tooth on the opposite edge of the shallow sulcus beneath. Intermediate tibiae armed with a very long spiniform tooth on the outer edge near the apex.

Length 8, breadth $5\frac{1}{2}$ millim. (♀.)

Hab. NICARAGUA, Chontales (*Belt*).

One specimen. Broader and larger than *D. violaceus*; the prothorax very broad, and arcuato-explanate at the sides; the elytra not depressed along the whole length of the suture, the striae deeper, those towards the suture less distinctly punctate; the metasternum binodose and somewhat protuberant in front; the intermediate tibiae armed with a long tooth externally.

This species is nearly allied to the South-American *D. tumidus* (Boh.), which has the metasternum bifurcate in front, &c. It is very like *Cylindrocerus smaragdinus* and *azureus*, Boh., both of which have a long antennal club.

2. *Diastethus violaceus*, sp. n. (Tab. XIII. figg. 2, 2 *a*, ♂.)

Rhomboidal, convex, shining, violaceous or blue, glabrous above; the prosternum, the sides and anterior portion of the metasternum, the ventral segments 1 and 2 (except laterally), and the other segments at the sides or apex, thickly clothed with narrow, whitish, striated scales, the rest of the under surface almost bare. Rostrum long, thickened and abruptly bent at the base, sparsely punctate, smooth at the tip, the antennae inserted at about the basal fifth, the club stout and ovate. Prothorax strongly rounded at the sides to the narrow anterior lobe, sparsely punctate, the base obliquely depressed on each side of the median lobe. Scutellum very broad, short. Elytra triangular, depressed below the basal margin and along the suture; punctate-striate, the sutural stria deep, the others fine and shallow, the punctures oblong in shape and conspicuous throughout, the interstices flat. Beneath with the squamose portions of the surface densely, finely punctate, the scattered punctures on the mesosternal side-pieces large and foveiform, those on the propleura and metathoracic episterna coarse; prosternal sulcus shallow, the anterior coxae widely separated; metasternum flattened, not prominent; ventral segment 1 very broadly excavate and 5 depressed down the middle, the depression on 5 limited on each side by a small cluster of scales. Femora sulcate and bidentate beneath, the anterior pair sometimes with a single tooth only. Tarsal joints 2 and 3 broad.

Length 5-6, breadth $3-3\frac{1}{2}$ millim. (♂.)

Hab. MEXICO (*Sallé*); NICARAGUA, Chontales (*Janson*).

Three males, the one from Chontales being much larger than the others. The violaceous colour, the very broad scutellum, the densely squamose portions of the under surface, and the broad tarsi characterize *D. violaceus*. It is allied to *D. politus* (Germ.), differing from that species in the finer squamosity of the under surface, the scales also extending over a portion of the ventral surface.

3. *Diastethus superbus*, sp. n. (Tab. XIII. figg. 3, 3 *a*, ♂.)

Oblong-subrhomboidal, finely alutaceous, golden-green, the disc of the prothorax in great part and the outer half of the elytra cupreous, the suture of the elytra violaceous, the under surface and legs green or bluish-green, the tarsi violaceous, the rostrum of the ♀ in great part and the antennae black; glabrous above, the under surface and legs clothed with short whitish hairs. Rostrum long, thickened at the base, punctate and alutaceous to near the tip in the ♂, longer, smoother, and shining in the ♀; antennae

slender, inserted at about one-third from the base of the rostrum in the ♀, and at some distance behind the middle in the ♂, the club rather small, ovate. Prothorax gradually narrowing to the short anterior lobe, moderately constricted in front, closely punctate. Scutellum strongly transverse. Elytra subtriangular, rather long, punctate-striate, the striae fine, the punctures oblong in shape, the interstices flat, faintly uniseriate-punctate. Beneath closely punctate, the punctures on the pleura coarse; prosternal sulcus deep; ventral segment 1 broadly depressed in the middle in the ♂. Femora feebly bidentate. Tarsal joints 2 and 3 broad.

Length $5-5\frac{2}{3}$, breadth $2\frac{3}{4}-3\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

One pair. A very beautiful insect, the cupreous portions of the upper surface gradually shading off into golden, and the golden into green. The fine alutaceous surface gives a silky appearance to the upper surface.

4. *Diastethus sulcipennis*, sp. n. (Tab. XIII. figg. 4, 4 a, ♂.)

Rhomboidal, shining, rufo-testaceous, the antennal club, knees, and tarsi infusate; glabrous above and beneath. Rostrum moderately stout, strongly arcuate, much longer than the head and prothorax, smooth, the antennae inserted far behind the middle, the club acuminate-ovate. Prothorax conical, strongly constricted in front, smooth, the median lobe truncate behind. Scutellum transverse. Elytra triangular, the humeri broadly, subangularly dilated; very deeply sinuate-striate, the striae obsolete punctate, the interstices smooth and strongly convex, the alternate ones a little broader and more raised than the rest. Beneath almost smooth; prosternal sulcus very deep, narrow, the ridges terminating in a blunt tubercle in front of each coxa, the coxae narrowly separated; ventral segment 1 depressed down the middle. Legs smooth; anterior femora uni-, the others bidentate.

Length $7\frac{2}{5}$, breadth $4\frac{4}{5}$ millim. (♂.)

Hab. COSTA RICA, Tablazo 1700 metres (*Biolley*).

One specimen, captured in Oct. 1904. A remarkably smooth form (perhaps black, when mature), with a conical prothorax, triangular, very deeply striate elytra, with dilated humeri and convex interstices, and deeply, narrowly sulcate prosternum. The two short teeth on the intermediate and posterior femora are placed opposite one another on the edges of the shallow sulcus. *D. christophori* (Boh.) has similarly convex elytral interstices.

5. *Diastethus pilipectus*, sp. n. (Tab. XIII. figg. 5, 5 a, ♂; 5 b, anterior tibia, ♂.)

Centrinus pilipectus, Chevr. in litt.

Subrhomboidal, convex, shining, black, the antennae ferruginous; the scutellum on each side, the pro- and metasternum, the anterior and intermediate coxae, the inner face of the anterior femora, and the apices of the tibiae, more or less densely clothed with long, golden, hair-like, striated scales; the rest of the upper surface bare, the abdomen with scattered minute hair-like scales. Head sparsely, finely punctate; rostrum strongly arcuate, long, slender, finely punctate at the base, and smoother thence to the apex, the antennae inserted at about the basal third or fourth, joint 2 of the funiculus a little shorter than 1, 3 shorter than 2, the club rather long, acuminate-ovate. Prothorax convex, rounded at the sides, almost smooth, the basal margin and the anterior lobe with scattered punctures. Scutellum large, transverse. Elytra triangular, depressed along the suture, deeply striate throughout, the striae faintly punctate, the interstices flat and almost smooth. Prosternal sulcus very shallow, squamose. Ventral segments sparsely punctate. Femora shallowly sulcate beneath, and each armed with two more or less distinct teeth, the outer tooth on the intermediate pair acute and larger than the inner one, which is sometimes almost obsolete. Tibiae sinuate, dilated at the apex.

♂. Prosternum unarmed; anterior tibiæ with the uncus at the apex developed into a long, broad, flattened, truncated process, the intermediate pair also with a broad spoon-shaped process at the tip; first ventral segment flattened in the middle.

Length $4\frac{2}{3}$ – $6\frac{1}{4}$, breadth $3\frac{1}{2}$ –4 millim. (♂ ♀.)

Hab. MEXICO, Panistlahuaca in Oaxaca (*Sallé*); GUATEMALA, Panzos (*Champion*); NICARAGUA (*Sallé*), Chontales (*Belt*); COSTA RICA, Guanacaste (*Pittier*).

Eight specimens. The dense golden vestiture of the pro- and metasternum, the two small clusters of scales on the scutellum, the very shallow prosternal sulcus, and the peculiar armature of the anterior and intermediate tibiæ of the male distinguish *D. pilipectus*.

6. *Diastethus mexicanus*. (Tab. XIII. figg. 6, 6 a, ♂.)

Centrinus mexicanus, Boh. in Schönh. Gen. Curc. viii. 1, p. 244 (nec Pascoe)¹.

Centrinus subarmatus, Boh. loc. cit. p. 247².

Broad, subrhomboidal, shining, black, glabrous above, the punctures of the under surface each bearing a hair-like scale. Rostrum stout, rather short, the antennæ inserted at about the middle. Prothorax smooth, sometimes with minute scattered punctures at the sides, depressed at the base on each side of the median lobe. Scutellum transverse. Elytra deeply striate, the striæ feebly punctate and becoming shallower towards the sides, the interstices smooth and flat, the sutural region slightly depressed at the base. Prosternal sulcus broad and deep. Anterior femora flattened and unidentate, the others sulcate and bidentate, beneath. Tibiæ triangularly dilated near the apex externally, the anterior pair sinuate.

♂. Prosternum armed with two spines, which vary in length and are sometimes wanting; first ventral segment slightly depressed down the middle; anterior tibiæ feebly hollowed towards the apex within. Length 4– $6\frac{1}{5}$, breadth $2\frac{3}{4}$ – $4\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO² (*Mus. Brit.*), Orizaba, Toxpan, Playa Vicente, Vera Cruz¹, Santa-comapan, Panistlahuaca (*Sallé*), Cordova (*Höge*), Amula (*H. H. Smith*), Temax in N. Yucatan (*Gaumer*); BRITISH HONDURAS, Rio Sarstoon (*Blancaneaux*); GUATEMALA, Panima in Vera Paz, Dueñas (*Champion*), Chimaltenango (*Conradt*).

A broad form, with rather deeply punctate-striate elytra, the interstices of which are broad, smooth, and flat throughout. The anterior femora are unidentate. I have seen the types of the two insects described by Boheman, and am unable to separate them; that of *C. subarmatus* is also from "Vera Cruz." Pascoe's *C. mexicanus*, the type of his genus *Rhianus*, is a very different insect.

7. *Diastethus ater*. (Tab. XIII. fig. 7.)

Centrinus ater, Boh. in Schönh. Gen. Curc. viii. 1, p. 251¹.

Subrhomboidal, shining, black, the antennæ sometimes ferruginous; glabrous above, the punctures of the under surface each bearing a minute hair-like scale. Antennal club ovate. Prothorax smooth or with a few widely scattered minute punctures. Scutellum strongly transverse. Elytra triangular, at most faintly depressed along the suture at the base; deeply striate throughout, the striæ feebly punctate, the interstices smooth and flat. Prosternal sulcus broad and deep, extending between the anterior coxæ. Femora each with two small teeth (one on each edge of the shallow groove beneath) and sometimes with two or three minute denticles also.

♂. Prosternum armed with two short spines, which are sometimes wanting; first ventral segment depressed down the middle; anterior tibiae hollowed and ciliate towards the apex within.
Length 3-6, breadth $1\frac{1}{10}$ - $3\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO (Sommer¹; *ex coll.* Flohr; Truqui, *in coll.* Fry), Acapulco, Cordova, Jalapa, Oaxaca (Höge), Toxpam (Sallé), Guerrero (Baron), Xucumanatlan, Omilteme, Chilpancingo (H. H. Smith), Temax in N. Yucatan (Gaumer); GUATEMALA, San Gerónimo, Zapote, Dueñas (Champion); PANAMA, Volcan de Chiriqui (Champion).—BRAZIL¹.

This is the commonest of the Central-American forms related to *D. mexicanus*. It is relatively narrower than that insect, and has the elytral striae deeply impressed and less distinctly punctate, and each of the femora armed with two distinct teeth. The single specimen from Dueñas is only 3 mm. in length, and has the prothorax more distinctly punctate than in any of the others we have received. One of the "types," communicated by Dr. Sjöstedt, is labelled "Texas (Dupont)," but there is perhaps some mistake about this locality, Boheman giving Mexico and Brazil only.

8. *Diastethus falcatus*.

Centrinus falcatus, Boh. in Schönh. Gen. Curc. viii. 1, p. 246¹.

Hab. COSTA RICA, Reventazon, Plains of Santa Clara, 200 metres, Atlantic slope (Biolley).—COLOMBIA (*Mus. Brit.*); BRAZIL¹.

The single (♂) specimen from Costa Rica (captured in Dec. 1904) referred to this species is very like *D. aztecus*, but has the prothorax more flattened on the disc, the elytra less depressed below the basal margin, and the tibiae bowed at the base. The prosternal spines of the male are moderately long; the sutural and marginal striae of the elytra are deeply impressed, the others faint; the anterior femora are uni-, the others bidentate. From *D. corvinus* it differs in having the suture of the elytra almost unimpressed, the rostrum stouter, the anterior femora unidentate, the tibiae less acutely dilated externally.

9. *Diastethus corvinus*, sp. n.

Subrhomboidal, broad, shining, black, glabrous, the ventral depression of the ♂ with a few golden, hair-like scales. Head very sparsely punctate, transversely depressed in front; rostrum strongly arcuate, long, comparatively slender, sparsely punctate, sulcate and strigose at the sides (the antennae missing). Prothorax strongly constricted in front, almost smooth, the short anterior lobe sparsely punctured, the base shallowly foveate on each side of the median lobe. Scutellum very short, arcuate, produced into a long, fine tooth in the middle behind. Elytra triangular, depressed along the suture and at the middle of the base, the humeri rounded; the sutural and outer striae deep, the others faint, all finely punctate, the interstices smooth. Beneath very sparsely punctate; prosternum armed with a conical prominence in front of each coxa, the sulcus broad and deep; ventral segment 1 depressed in the middle. Femora each with two small teeth and several denticles. Tibiae acutely, triangularly dilated on the outer edge near the apex, feebly curved at the base, the anterior pair narrow, strongly sinuate, and with the terminal spur widened towards the base.

Length $5\frac{1}{2}$, breadth $3\frac{3}{8}$ millim. (♂.)

Hab. MEXICO (*Mus. Brit.*).

One male, labelled *Centrinus subarmatus*, S., in the British Museum, but differing from that species in the longer and more slender rostrum, the basally depressed, more feebly striate elytra, the bidentate femora, and the sharply dilated apices of the tibiae. It is nearly related to *D. aztecus*, but has a less convex prothorax, apically dilated tibiae, &c. The tibiae are narrower and less bowed at the base than in *D. falcatus* and armed with a much sharper prominence near the apex.

10. *Diastethus pilipes*, sp. n. (Tab. XIII. figg. 8, 8 a, ♂.)

Oblong-subrhomboidal, shining, black, the antennae ferruginous, with the club darker; glabrous above, the pro- and metasternum and the anterior and intermediate coxae clothed with hair-like, yellowish-white, striated scales, the punctures on the rest of the under surface each bearing a minute scale, the femora beneath and the inner edge of the tibiae sparsely pilose or ciliate. Head sparsely punctate; rostrum strongly arcuate, moderately long, thickly punctate, the antennae inserted at a little behind the middle, joint 2 of the funiculus much shorter than 1, the club ovate. Prothorax convex, rounded at the sides, sparsely, minutely punctate. Scutellum transverse. Elytra triangular, rather long, the humeri not very prominent; sharply striate throughout, the striae feebly punctate, the interstices smooth and flat. Prosternal sulcus narrow, deep. Anterior femora uni-, the others bidentate.

♂. Prosternum unarmed; metasternum and first ventral segment broadly depressed down the middle; anterior tibiae closely ciliate within from the base to the apex.

Length $5\frac{1}{5}$ – $6\frac{1}{3}$, breadth $2\frac{1}{10}$ – $3\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); COSTA RICA, Alajuela (*Orosco*).

Three males. More elongate than *D. ater*, the prosternum squamose and with a narrower sulcus, the anterior femora with one distinct tooth only, the tibiae more or less ciliate within, the metasternum, as well as the first ventral segment, depressed in the middle in the male. The Mexican specimens are labelled with the MS. name *Centrinus albopunctatus*, Chevr., in the Sallé collection.

11. *Diastethus brevis*, sp. n. (Tab. XIII. figg. 9, 9 a, ♂.)

Subrhomboidal, short, convex, shining, black, the antennae and the tips of the tarsi ferruginous; glabrous above, the punctures of the under surface each bearing a minute hair-like scale, the lower surface of the femora and inner edge of the tibiae sparsely pilose. Head finely punctate; rostrum stout, strongly arcuate, comparatively short, sparsely punctate, the antennae inserted far behind the middle, the club ovate and rather small. Prothorax convex, rounded at the sides, very sparsely, finely punctate. Scutellum strongly transverse, short. Elytra triangular, the humeri moderately prominent, the suture slightly depressed; deeply striate throughout, the striae feebly punctate, the interstices flat and almost smooth. Prosternal sulcus very shallow and ill-defined. Femora shallowly sulcate beneath, each armed with two short sharp teeth.

♂. Prosternum unarmed; first ventral segment with a deep transverse excavation.

Length $3\frac{2}{3}$, breadth $2\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One specimen. A species of comparatively short form, with a shallow, indeterminate prosternal sulcus, a small antennal club, a rather short, stout rostrum, a

distinctly punctate prothorax, deeply striate elytra, with smooth flat interstices, and bidentate femora.

12. *Diastethus ruficollis*. (Tab. XIII. figg. 10, 10 *a*, ♂.)

Centrinus ruficollis, Boh. in Schönh. Gen. Curc. iii. p. 781¹.

Subrhomboidal, shining, black, the prothorax (the anterior lobe excepted) rufous above, the antennæ sometimes obscure ferruginous; glabrous above, the punctures of the under surface each with a minute hair-like scale. Rostrum thickly punctate in the ♂, much smoother in the ♀. Antennal club ovate. Prothorax almost smooth. Scutellum strongly transverse. Elytra triangular, deeply striate throughout, the striæ faintly punctate, the interstices flat, the sutural region not depressed. Prosternal sulcus deep. Femora bidentate, and sometimes with one or two small denticles also.

♂. Prosternum unarmed; first ventral segment depressed down the middle.
Length $5-6\frac{1}{2}$, breadth 3-4 millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in coll. *Fry*; ex coll. *Flohr*), Cuernavaca (*Sallé*, *Höge*), San Andres Tuxtla, Toxpam, Playa Vicente, Vera Cruz, Yolos (*Sallé*), Chilpancingo, Amula (*H. H. Smith*), Tehuantepec (*Mus. Brit.*); NICARAGUA, Chontales (*Belt*).—BRAZIL¹.

Not uncommon in Mexico and perhaps nothing more than a colour-variety of the subsequently described *D. ater*. The elytra are deeply striate, and the femora are bidentate and also more or less denticulate.

13. *Diastethus sanguinicollis*.

Cryptorhynchus sanguinicollis, Germ. Ins. Sp. Nov. p. 224¹.

Centrinus sanguinicollis, Boh. in Schönh. Gen. Curc. iii. p. 779²; viii. 1, p. 243³.

Hab. MEXICO, Toxpam (*Sallé*).—BRAZIL^{1 2 3}.

There is a single small specimen of this species from Mexico in the Sallé collection. It is very like *D. ruficollis*, but the elytral striæ are faint on the middle of the disc (the sutural and marginal striæ only are deeply impressed), and the anterior femora alone are distinctly bidentate.

14. *Diastethus erythroderes*, sp. n. (Tab. XIII. figg. 11, 11 *a*, ♀.)

Subrhomboidal, convex, shining, black, the prothorax (the anterior lobe excepted) rufo-testaceous above, the antennæ fusco-ferrugineous; glabrous above, the punctures of the under surface each with a minute hair-like scale. Head sparsely, finely punctate; rostrum strongly arcuate, thickened towards the base and flattened towards the tip, almost smooth, the basal portion only striato-punctate at the sides, the scrobes extending forward to near the apex, the antennæ inserted behind the middle, joints 2-6 of the funiculus short, together about the same length as the stout, oblong-ovate club. Prothorax transverse, strongly bisinuate at the base, almost smooth. Scutellum transverse. Elytra triangular, deeply striate throughout, the striæ faintly punctate, the interstices smooth and flat. Beneath sparsely, rather coarsely punctate. Prosternal sulcus broad and deep. Anterior femora unidentate, the others sulcate and bidentate beneath.

♂. Prosternum unarmed; first ventral segment broadly flattened in the middle.
Length $5\frac{1}{4}-6$, breadth $3\frac{1}{3}-3\frac{2}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Acapulco, Jalapa (*Höge*), Toxpam (*Sallé*).

Three specimens, one of which is immature. This is one of three species labelled with the MS. name *Centrinus erythroderes*, Chevr., in the Sallé collection. It may be recognized at once from the other forms with a red prothorax by the laterally sulcate rostrum (the groove being continued forward to near the tip), the long, stout, antennal club (as long as in some of the species of *Cylindrocercus*), and the unidentate anterior femora.

15. *Diastethus aztecus*, sp. n. (Tab. XIII. figg. 12, 12 a, ♂.)

Subrhomboidal, shining, black, the prothorax sometimes reddish, glabrous above, the scattered punctures of the under surface each bearing a minute hair-like scale. Prothorax strongly rounded at the sides from near the base to the narrow, tubulate, anterior portion, smooth, very convex or almost gibbous on the disc. Scutellum transverse. Elytra depressed below the prominent basal margin, the sutural striae and those along the lower margin deep, the other striae faint, the interstices smooth and flat, the basal lobe rounded, the humeri rounded and rather prominent. Prosternal sulcus deep. Femora each with two small teeth, the anterior pair sometimes with a single distinct tooth and two or three small denticles.

♂. Prosternum armed with two spines of variable length, sometimes with a deep circular excavation between them; first ventral segment broadly flattened down the middle.

Length $3\frac{1}{2}$ –6, breadth $2\frac{1}{4}$ – $3\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Acapulco (*Höge*), Oaxaca (*Mus. Brit.*, *Höge*), San Andres Tuxtla, Toxpam, Panistlahuaca, Tehuantepec (*Sallé*), Atoyac, Vera Cruz (*H. H. Smith*), Temax in N. Yucatan (*Gaumer*); GUATEMALA, Panzos (*Champion*); PANAMA, Caldera in Chiriqui (*Champion*).

One of many similar shining black forms, and distinguishable by the very convex disc of the prothorax, the faintly striate disc of the elytra (the sutural and marginal striae alone deeply impressed), and the almost glabrous, sparsely punctate under surface. The prosternal spines of the male vary greatly in length, and in most of the well-developed specimens the broadly sulcate prosternum has a very deep circular excavation between them. The three specimens from Chiriqui are very small, and two of them have the prothorax rufescent.

16. *Diastethus gracilirostris*, sp. n. (Tab. XIII. fig. 13, ♂.)

Subrhomboidal, shining, fusco-castaneous, the rostrum and antennae obscure ferruginous; glabrous above and beneath. Rostrum very long and slender, thickened at the base and widened at the apex, strongly arcuate, the basal portion only punctate, the antennae inserted at about the basal fourth, joints 1 and 2 of the funiculus elongate, equal in length, 3–7 short, the club rather long, acuminate-ovate. Prothorax broad, convex, somewhat gibbous on the disc, the sides arcuately converging from the base, abruptly constricted in front, the base obliquely depressed on each side of the median lobe; sparsely punctate, the punctures becoming much coarser towards the sides. Scutellum transverse. Elytra triangular, slightly depressed below the basal margin and along the suture anteriorly, the disc also with a faint transverse depression extending across the interstices 3 and 4 before the middle; deeply striate, the striae faintly punctate, the interstices smooth and flat. Beneath rather sparsely punctate, the punctures on the pro-, meso-, and metapleura very coarse. Prosternum with the anterior portion long and declivous, slightly depressed down the middle, and with a minute tubercle in front of each coxa, the coxae widely separated. Ventral segment 1 flattened and alutaceous in the middle and here connate with 2. Femora clavate and

feebly bidentate, the teeth on the anterior pair almost obsolete. Tarsi with joints 2 and 3 broadly dilated.

Length 4, breadth $2\frac{3}{4}$ millim. (σ .)

Hab. MEXICO, Teapa (*H. H. Smith*).

One specimen, evidently a male, the very long, slender, almost smooth rostrum notwithstanding. *D. gracilirostris* may be known from all the allied forms by the broadly dilated second and third tarsal joints. The prosternum is slightly depressed between the minute ante-coxal tubercles.

17. *Diastethus interruptus*, sp. n. (Tab. XIII. fig. 14, σ .)

Subrhomboidal, broad, shining, castaneous, the rostrum and legs blackish; glabrous above and beneath.

Rostrum long, moderately stout, smooth, the sides sparsely punctate at the base, the antennæ inserted far behind the middle, the club acuminate-ovate. Prothorax rounded at the sides anteriorly, strongly constricted in front; the surface almost smooth, the anterior lobe with minute scattered punctures. Scutellum transverse. Elytra triangular, much wider than the prothorax, depressed along the suture, each with two abrupt, deep, transverse excavations on the disc (one below the shoulder, the other beyond the middle); deeply striate throughout, the striæ feebly punctate, the interstices smooth. Beneath very sparsely punctate, the punctures on the pro-, meso-, and metapleura very coarse, those on the abdomen fine. Prosternal sulcus broad and deep, the anterior coxæ distant. Femora unidentate.

σ . Prosternum armed with a rounded tubercle in front of each anterior coxa; first ventral segment flattened.

Length $6\frac{1}{5}$, breadth 4 millim. (σ .)

Hab. GUATEMALA, Cubilguitz in Alta Vera Paz (*Champion*).

One specimen. Not unlike *D. bidentatus*, but with biplicate elytra, unidentate femora, and a broadly sulcate prosternum, the prosternum armed with two blunt tubercles in the male.

18. *Diastethus bidentatus*, sp. n. (Tab. XIII. fig. 15, σ .)

Subrhomboidal, convex, shining, black, the antennæ ferruginous, the elytra and legs sometimes castaneous; glabrous above, the pro- and metasternum and the anterior and intermediate coxæ somewhat thickly clothed with yellowish-white or golden, hair-like, striated scales, the rest of the vestiture of the under surface, and that of the legs, very sparse and fine. Head sparsely, finely punctate; rostrum long, strongly arcuate, comparatively slender, thickened at the base, very sparsely punctate, the antennæ inserted far behind the middle, the club ovate. Prothorax rounded at the sides anteriorly, strongly constricted in front, smooth, or with a few minute scattered punctures. Elytra triangular, depressed along the suture and each with a transverse excavation on the inner part of the disc beyond the middle; deeply striate throughout, the striæ obsoletely punctate, the interstices smooth and flat. Beneath sparsely punctate. Prosternal sulcus narrow, glabrous. Anterior coxæ narrowly separated. Femora sulcate and bidentate beneath. Tibiæ sinuate, dilated at the apex externally.

σ . Prosternum unarmed; first ventral segment broadly excavate in the middle.

Length $4\frac{9}{10}$ -7, breadth $2\frac{3}{4}$ -4 millim. (σ σ .)

Hab. MEXICO (*coll. Solari*), Playa Vicente and Santacomapan in Vera Cruz (*Sallé*: σ σ); NICARAGUA, Chontales (*Belt*: σ); PANAMA, Bugaba (*Champion*: σ).

Eight specimens, one only of which is a male. Near *D. pilipectus*, with which it was confused in the Sallé collection, but readily recognizable by the glabrous scutellum,

the less densely squamose prosternum, with deeper glabrous sulcus, the plicate elytra, and the simply unguiculate anterior tibiæ in both sexes. The examples with castaneous elytra are probably immature.

19. *Diastethus impressipennis*, sp. n.

Very like *D. bidentatus*, but broader; the prothorax a little less convex, with the sides arcuately converging from the base; the elytra less depressed along the suture, and with a shallower transverse depression on the disc beyond the middle; the under surface more sparsely punctate, and with the scattered hair-like scales finer; the prosternal sulcus a little broader; the femora sharply bidentate and rather deeply sulcate beyond the middle.

Length 6-7, breadth 4-4½ millim. (♀.)

Hab. MEXICO (*Mus. Brit.*), Toxpam (*Sallé*), Cordova (*Höge*).

Three females, differing from the same sex of *D. bidentatus* as noted above. In its general shape *D. impressipennis* agrees with *D. mexicanus*. From *D. brevis* and *D. ater* it may be known by the transverse depression on each elytron beyond the middle.

20. *Diastethus humerosus*, sp. n. (Tab. XIII. figg. 16, 16 a, ♂.)

Rhomboidal, convex, shining, black, the prothorax rufescent, the elytra each with a very large, transverse, testaceous, humeral patch which nearly reaches the suture; glabrous above and beneath. Rostrum strongly arcuate, long, very sparsely, finely punctate. Antennal club stout, acuminate-ovate, as long as joints 3-7 of the funiculus united. Prothorax convex, rapidly, arcuately narrowing from the base, strongly constricted in front, the base obliquely foveate on each side of the median lobe; smooth. Scutellum small, transverse. Elytra short, triangular, depressed along the suture, the humeri rounded and forming a continuous outline with the sides of the prothorax; sharply striate throughout, the striae obsoletely punctate, the interstices smooth and feebly convex. Beneath coarsely punctate, the ventral segments 2-5 smoother, 1 broadly depressed in the middle and 5 closely ciliate along the apical margin; prosternum with a broad, smooth, flattened space down the middle, which is bifoveate in the apical constriction, the anterior coxæ widely separated. Legs sparsely punctate; anterior femora feebly, the others distinctly dentate, the tooth on the posterior pair acute; tibiæ subangularly dilated on the outer edge near the base, the anterior pair sinuous; tarsal joints 2 and 3 broad.

Length 2½, breadth 1½ millim. (♂.)

Hab. PANAMA, David (*Champion*).

One male. Smaller than *D. humeronotatus*, the prothorax not so convex on the disc, the elytra sharply striate throughout, the humeri less swollen, the testaceous patch nearly reaching the suture, the rostrum less bowed at the base, the tibiæ subangular at the base externally.

21. *Diastethus castaneus*, sp. n. (Tab. XIII. figg. 17, 17 a, ♂.)

Subrhomboidal, short, castaneous or ferruginous, glabrous above. Rostrum (♂) strongly arcuate, long, the basal portion thickened and coarsely punctate, the apical portion sulcate at the sides and somewhat closely punctate, (♀) longer and with the apical portion very much smoother, the antennæ inserted far behind the middle, the club oblong-ovate, stout. Prothorax rounded at the sides anteriorly, strongly constricted in front, gibbous at the middle and obliquely depressed or sulcate on each side of this, the surface finely punctate or smooth. Scutellum transverse. Elytra short, triangular, the disc slightly swollen below the base and transversely depressed at the middle, the suture also depressed anteriorly, the

humeri rounded and prominent; sharply striate throughout, the striæ obsoletely punctate, the interstices smooth and flat. Pro-, meso-, and metapleura coarsely, the rest of the under surface more finely, punctate; prosternal sulcus shallow, rather broad, the anterior coxæ distant; ventral segment 1 slightly depressed in the middle in the ♂. Femora clavate, coarsely punctate, the intermediate and posterior pairs sharply dentate, the anterior pair without distinct tooth. Tarsal claws small, subconnate.

Var. Smaller, the propleura almost impunctate.

Length $1\frac{7}{8}$ – $3\frac{1}{10}$, breadth $1\frac{1}{4}$ – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Vera Cruz (*Sallé*); GUATEMALA, San Juan and San Gerónimo in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Four specimens, eight of which belong to the small, smoother form from Chiriqui.

This species may be known from its Central-American allies by the gibbous prothorax, uneven elytra, which (owing to the depressed suture and the transverse depression at the middle of the disc) appear to be swollen below the base, and castaneous or ferruginous colour.

22. *Diastethus humeronotatus*, sp. n. (Tab. XIII. figg. 18, 18 a, ♀.)

Rhomboidal, short, convex, shining, black, the prothorax sometimes rufo-piceous, the elytra each with a very large rufo-testaceous humeral patch; glabrous above and beneath. Rostrum very long, rather slender, thickened, punctate, and abruptly bowed at the base in the ♀, a little stouter and shorter in the ♂. Antennal club long and stout, acuminate-ovate. Prothorax convex, almost gibbous at the middle of the disc, arcuately narrowing from the base, strongly constricted in front; smooth, the base obliquely foveate on each side of the median lobe. Scutellum transverse. Elytra broad, transversely cordate, depressed below the basal margin and along the suture, the humeri broadly rounded, prominent; the sutural and marginal striæ deep, the others faint or obsolete, bearing scattered oblong punctures, the interstices smooth and flat. Beneath coarsely punctate along the sides, the ventral segments very sparsely, finely punctate; prosternum with a broad flattened space down the middle, which is hollowed between the somewhat widely-separated anterior coxæ. Anterior femora unarmed, the others sharply dentate. Tarsal joints 2 and 3 broad.

Length 3 – $3\frac{1}{2}$, breadth $2\frac{1}{10}$ – $2\frac{3}{5}$ millim. (♂ ♀?)

Hab. PANAMA, David and Caldera in Chiriqui (*Champion*).

Five specimens, all from the savana-region bordering the Pacific.

A species with broad, transversely cordate, obsoletely striate, elytra, each of which has a large rufo-testaceous humeral patch. Smaller than the S.-American *Centrinus scapularis*, Boh. (the type of which I have seen), the posterior lobe of the prothorax much more convex, the rostrum more curved at the base, the intermediate and posterior femora dentate, &c.

23. *Diastethus rufipennis*, sp. n. (Tab. XIII. figg. 19, 19 a, ♂.)

Rhomboidal, shining, black, the elytra rufous, in one specimen with the scutellar region and a large apical patch, connected along the suture, black; glabrous above. Rostrum long, arcuate, thickened and abruptly bent downward at the base, sparsely punctate, sulcate at the sides to near the apex. Mandibles with a sharp tooth on the outer edge beneath. Antennal club ovate. Prothorax short and broad, transversely convex, rounded at the sides, strongly constricted in front, the base almost unimpressed, smooth. Scutellum transverse. Elytra triangular, depressed along the suture anteriorly; deeply striate throughout, the striæ feebly punctate, the interstices smooth and flat. Beneath closely punctate, the

punctures on the meso- and metapleura coarse; prosternal sulcus narrow, the coxæ narrowly separated; ventral segment 1 excavate down the middle in the ♂. Femora denticulate and also armed with one or two longer acute teeth. Tarsal joint 2 much narrower than 3.

Length $3\frac{1}{2}$ –4, breadth $2\frac{1}{3}$ – $2\frac{2}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpan and Yolos (*Sallé*), Oaxaca (*Höge*).

Four specimens. A small species, with short, broad prothorax, and sharply striate, red elytra, the latter sometimes black at the base and apex. The striæ are broader than in *D. humerosus* and the second tarsal joint is relatively narrower. The mandibles have a sharp tooth on the outer edge beneath. The teeth on the anterior femora are shorter than those on the other two pairs. The following two forms are closely related to *D. rufipennis*, but they cannot be satisfactorily included under that species.

24. *Diastethus pallidipennis*, sp. n.

Very like *D. rufipennis*, but with the antennæ, tip of the rostrum, tarsi, and apices of the tibiæ ferruginous, and the elytra testaceous; the striæ of the elytra deeper, with coarse seriate punctures showing through from beneath, the interstices convex; the mandibles with a tooth at the sides beneath.

Length $3\frac{1}{5}$ –4, breadth $2\frac{1}{3}$ millim. (♂.)

Hab. MEXICO, Yolos in Oaxaca (*Sallé*).

Three males.

25. *Diastethus obliquus*, sp. n. (Tab. XIII. figg. 20, 20 a, ♀.)

Very like *D. rufipennis*, but with the antennæ, tip of the rostrum, tarsi, apices of the tibiæ, and a very broad oblique stripe on each elytron extending from the shoulder to the suture, ferruginous; the striæ of the elytra deep, the interstices flat; the mandibles with a tooth at the sides beneath.

Length $3\frac{2}{5}$, breadth $2\frac{1}{10}$ millim. (♀.)

Hab. MEXICO (*coll. Solari*).

One female, evidently fully mature.

RHIANOPSIS, gen. nov.

Mandibles rather long, stout, without tooth on their inner edge, dehiscent at the apex; rostrum stout, curved, elongate; prothorax narrow and tubulate in front, deeply bisinuate at the base; scutellum well-developed, free, transverse; pygidium not visible; prosternum broadly sulcate, unarmed; mesosternum depressed; all the coxæ very widely separated; femora subclavate, almost smooth, sharply unidentate, without trace of sulcus beneath, except at the apex; tibiæ strongly unguiculate at the apex; tarsi rather narrow, the claws long and divergent; body elliptic, polished, glabrous above.

Type, *R. ferrugineus*.

This genus is based on a single species from Panama which is nearly related to *Rhianus* and *Diastethus*. The very widely-separated anterior coxæ, the rather long, unemarginate, dehiscent mandibles, the non-sulcate, unidentate, almost smooth, clavate femora, the broadly sulcate, unarmed prosternum, the long, divergent tarsal claws, and the elliptic general shape are its chief characters.

1. *Rhianopsis ferrugineus*, sp. n. (Tab. XIII. figg. 22, 22 *a*, ♂.)

Ferruginous, the anterior lobe of the prothorax and the rostrum piceous; glabrous above, the punctures of the under surface each bearing an extremely minute scale. Head finely punctate; rostrum thickly punctate and striate to the tip, the antennæ inserted at a little behind the middle, the club ovate. Prothorax rather long, somewhat rounded at the sides, narrowing from the base, constricted in front, excavate behind the eyes beneath; the anterior lobe conspicuously punctate, the other portion with extremely minute scattered punctures. Scutellum shallowly sulcate. Elytra barely one-half longer than the prothorax, and at the sides forming almost a continuous outline with it, rapidly narrowing from a little below the base, depressed along the suture anteriorly; finely punctate-striate, the interstices feebly convex, strongly so at the apex, and with very minute scattered punctures. Beneath sparsely punctate; prosternal sulcus very broad, reaching to the middle of the coxæ; ventral segment 1 flattened in the middle. Anterior tibiæ ochreo-ciliate within from near the base to the apex.

Length 5-6, breadth $2\frac{3}{4}$ - $3\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

Three specimens, all alike and apparently mature. A peculiar form, with the femora almost smooth (as in *Lissobaris*), the prothorax excavate opposite the eyes beneath, and the anterior tibiæ ciliate within; the body very shining and almost bare; the rostrum long, stout, and rugosely punctate to the tip.

LISSOBARIS, gen. nov.

Rostrum curved, stout, moderately long, the scrobes rapidly spreading and becoming confluent beneath, the antennæ inserted at the middle, the antennal club ovate and rather small; mandibles very short, emarginate within, closely fitting when closed; eyes transverse; prothorax abruptly narrowed and tubulate in front, feebly sinuate at the base; scutellum small, free, transversely subquadrate; elytra elongate-triangular; pygidium not visible; prosternum unarmed, sulcate down the middle, the groove extending backward between the anterior coxæ, the latter large, exerted, and narrowly separated; mesosternum depressed; femora unarmed, clavate; tibiæ strongly unguiculate at the apex; tarsi rather narrow, the claws long and divergent; body convex, elongate-elliptic, polished, almost glabrous.

Type, *L. nigropiceus*.

The single species referred to this genus is very like *Rhianopsis ferrugineus*, but has differently-formed mandibles, narrowly separated, large, exerted anterior coxæ, unarmed femora, &c. The fully-developed male (as in various other Barids) has remarkable sexual characters, but these are in great part wanting in the undeveloped form, which is very like the female.

1. *Lissobaris nigropiceus*, sp. n. (Tab. XIII. fig. 23, 23 *a*, ♂; 23 *b*, intermediate leg, ♂.)

Nigro-piceous, shining, glabrous above, the depressed portions of the under surface with a few ochreous hairs. Head with scattered minute punctures; rostrum about as long as the head and prothorax, sparsely, finely punctate. Prothorax a little broader than long, the sides rounded anteriorly and parallel behind, the short anterior lobe narrow; the surface with excessively minute, scattered punctures. Scutellum shallowly sulcate. Elytra slightly wider than the prothorax, compressed at the sides, excavate along the suture anteriorly, depressed on each side at the base, the humeri rounded, the apices separately rounded; very finely or obsoletely punctate-striate, the sutural stria deeper, the interstices flat from the base to the apical declivity, where they are sharply costate. Under surface and femora almost smooth. Tibiæ finely ciliate within.

Fully developed ♂. Prosternum produced and somewhat raised posteriorly, armed with a small tubercle behind each anterior coxa; prosternal sulcus dilated anteriorly into a very broad, laterally-rounded, pilose depression; metasternum and first two ventral segments very broadly excavate down the middle, sparsely punctate, and also set with a few erect hairs, the fifth segment with a transverse, punctate, sparsely pilose depression at the apex; femora sulcate and ochreo-ciliate along their lower face; tibiae shallowly sulcate, carinate, and ochreo-ciliate within, the anterior and intermediate pairs somewhat bowed at the apex.

Undeveloped ♂. Prosternum less produced and unarmed behind the coxae; prosternal sulcus parallel-sided, bare; first ventral segment broadly excavate, bare; femora not sulcate beneath, glabrous; tibiae sparsely ciliate within.

Length $6\frac{1}{2}$ – $8\frac{1}{2}$, breadth 3 – $4\frac{1}{10}$ millim. (♂ ♀.)

Hab. COSTA RICA, Carrillo (*Underwood*: ♂); PANAMA, Volcan de Chiriqui 2500–4000 feet (*Champion*: ♂ ♀).

Three specimens, evidently belonging to one species, the great difference in the two males notwithstanding. The Chiriqui pair are much alike, except that the male has the first ventral segment broadly excavate and the anterior tibiae are curved at the apex.

CYLINDROCERUS.

Cylindrocerus, Schönherr, Curc. Disp. Meth. p. 310 (1826); Gen. Curc. iii. p. 789; viii. 1, p. 260 (part.); Lacordaire, Gen. Col. vii. p. 235.

The species of this Tropical-American genus, nine of which are now recorded from within our limits, may be known by the following characters:

Rostrum elongate, strongly arcuate, becoming gradually or abruptly thinner and smoother in its apical half, especially in the ♀, the antennae usually inserted at (♀) or at a little beyond (♂) the middle, the antennal club stout, elongate or oblong-ovate, at least as long as joints 3–7 of the funiculus united, the sutures often obsolete; mandibles rather long, straight on their inner edge, dehiscent at the tip; eyes large; prothorax more or less conical; scutellum free, small, subquadrate; elytra triangular; pygidium not visible; prosternum more or less hollowed or excavate in the middle before the anterior coxae, bifoveate or with a deep transverse pit in front (to receive the apex of the scape in repose), in the fully-developed ♂ armed with two spines or tubercles, and with a deep circular cavity between them; mesosternum depressed; femora clavate, unarmed; tibiae in the typical forms feebly unguiculate, the anterior pair in the ♂ often ciliate within; anterior tarsi sometimes hairy in the ♂; tarsal claws long, divergent; body more or less rhomboidal, flattened above, polished, usually with squamose spots or lines, above and beneath.

As thus defined, and as restricted by Lacordaire, *Cylindrocerus* includes Schönherr's first section only of the genus, all these species having the general facies of the "Madarides." The male-characters are well-marked, though varying in development, but there is no appreciable difference in the length of the antennal club in the two sexes.

- a. Third elytral interstice with a line of ochreous scales reaching to near the apex*; pro-, meso-, and metapleura, and the sides of the abdomen, with an interrupted series of ochreous spots.

* The fifth interstice is similarly marked in some of the S.-American forms.

- a*¹. Prothorax about as long as broad; elytra concave at base, without transverse depressions; antennal club very elongate *comma*, Schönh.
- b*¹. Prothorax broader than long; elytra flattened and with shallow transverse depressions; antennal club oblong-ovate, shorter *madaroides*, sp. n.
- b*. Third elytral interstice with an oval or oblong, ochreous or white, spot at the base.
- c*¹. Elytra sharply striate throughout; antennal club oblong-ovate.
- a*². Metapleura and sides of first ventral segment each with an ochreous spot *glabripectus*, sp. n.
- b*². Metapleura only with an oblong ochreous patch *subulatus*, sp. n.
- c*². Pro- and metapleura, prosternum, and sides of first ventral segment with ochreous or white spots *squamipectus*, sp. n.
- d*². Pro-, meso-, and metapleura, and sides of abdomen, with a complete or interrupted white band, extending across the prosternum; prothorax rounded at sides *circumlineatus*, sp. n.
- e*². Pleura and sides of abdomen bare *longipennis*, sp. n.
- d*¹. Elytra with the sutural stria sharply defined, the others faint or obsolete; pro- and metapleura, and sides of second ventral segment, with white spots; antennal club elongate *lissonotus*, sp. n.
- c*. Third elytral interstice and under surface bare: body more elongate, and legs longer; antennal club elongate *glabratus*, sp. n.

1. *Cylindrocerus comma*. (Tab. XIII. figg. 24, 24 a, ♂.)

Centrinus (Cylindrocerus) comma, Schönh. Curc. Disp. Meth. p. 311¹.

Cylindrocerus comma, Schönh. Gen. Curc. viii. 1, p. 261².

Cylindrocerus signum, Boh. in Schönh. Gen. Curc. iii. p. 790 (nec Fabr.)³.

Oblong-rhomboidal, somewhat concave above, black or nigro-piceous, shining; an attenuate stripe extending down the basal two-thirds of the third elytral interstice, an interrupted series of spots and streaks along the sides of the body beneath, a transverse patch on the middle of the first ventral segment in the ♂, and a spot between the anterior coxæ (♂), or a broad space down the middle of the prosternum (♀), densely clothed with oval, ochreous or yellowish-white scales, the rest of the surface almost bare. Head finely punctate; rostrum longer than the head and prothorax, stout and coarsely punctate to the points of insertion of the antennæ, then becoming slender and smoother to the tip, the apical portion abruptly narrower and impunctate in the ♀, the antennæ inserted far beyond the middle in the ♂, and at a little behind the middle in the ♀, the antennal club greatly elongated and nearly as long as the funiculus in both sexes. Prothorax subconical, about as long as broad, almost smooth, the anterior lobe with a few fine punctures. Elytra triangular, very little longer than the prothorax, transversely depressed on the disc anteriorly; sharply punctate-striate, the interstices almost flat, the third closely, minutely punctate to beyond the middle. Beneath very sparsely and minutely, the sides and the squamigerous portions of the surface closely and rather coarsely, punctate. Prosternum bifoveate in the anterior constriction.

♂. Prosternum armed with two curved spines of variable length and with a deep circular cavity between them; ventral segment 1 with a shallow transverse squamigerous depression; anterior tibiæ strongly ciliate within from about the middle to the apex; anterior tarsi hairy beneath and dilated.

Length 4-5½, breadth 1½-2⅞ millim. (♂ ♀.)

Hab. PANAMA, Tolé (*Champion*).—SOUTH AMERICA, Cayenne and Brazil^{2 3}.

The typical form of this insect has been found in abundance at Tolé; the vars. β

and γ of Schönherr have a short additional streak on the fifth elytral interstice, and they may belong to a different species. The sexual marks of distinction are strongly marked in *C. comma*, the rostrum being abruptly narrowed from behind the middle, and smooth thence to the tip, in the ♀. The prosternal spines of the ♂ vary in length. The antennal club is very elongate in both sexes.

2. *Cylindrocerus madaroides*, sp. n. (Tab. XIII. figg. 25, 25 a, b, ♂.)

Oblong-rhomboidal, flattened above, black, shining; a stripe on the third elytral interstice (reaching to near the apex), and sometimes a small spot at the middle of the fifth, and an interrupted series of spots and streaks along the sides of the body beneath (often abraded or wanting on the propleura), densely clothed with oblong or oval, ochreous scales, the rest of the surface almost bare. Head finely punctate; rostrum longer than the head and prothorax, stout, becoming more slender in its outer half, coarsely punctate at the sides, almost smooth above and towards the apex, the antennæ inserted near the middle in both sexes, the club stout, oblong-ovate, about as long as joints 2-7 of the funiculus united. Prothorax conical, broader than long, almost smooth. Elytra triangular, flat on the disc, with one or two shallow transverse depressions towards the sides, the humeri rounded; sharply punctate-striate, the interstices flat, the third closely punctate. Beneath sparsely, the sides of the meso- and metasternum coarsely, punctate. Prosternum with a deep transverse excavation in front.

♂. Prosternum armed with two blunt spines or tubercles, and with a deep circular cavity between them; ventral segment 1 broadly excavate in the middle; anterior tibiæ sparsely ciliate within.

♀. Prosternum with a shallow transverse depression in the middle before the anterior coxæ.

Length $4\frac{1}{8}$ – $5\frac{3}{8}$, breadth $2\frac{1}{10}$ – $2\frac{3}{4}$ millim. (♂ ♀.)

Hab. GUATEMALA, Purula, San Gerónimo, Calderas (*Champion*).

Nine specimens. Closely related to *C. comma*, but with the antennal club shorter, the prosternum with a deep transverse cavity in front (instead of two foveæ), the spines short, the rostrum very similarly formed in the two sexes, the prothorax more transverse, the ochreous stripe on the third elytral interstice longer, &c.

3. *Cylindrocerus glabripectus*, sp. n.

Oblong-rhomboidal, flattened above, shining, black; an oval spot at the base of the third elytral interstice, a spot at the middle of the metathoracic episterna, another at the sides of the first ventral segment, and sometimes a smaller one at the sides of the fourth segment, thickly clothed with ochreous or whitish scales, the rest of the upper and under surfaces almost bare. Head with a few minute punctures; rostrum much longer than the head and prothorax, stout and rather coarsely punctate in its basal half, the apical half more slender and almost smooth, the antennæ inserted at (♀) or a little beyond (♂) the middle, the antennal club about as long as joints 2-7 of the funiculus united. Prothorax conical, broader than long, strongly constricted in front, almost smooth. Elytra triangular, flattened, and with one or two shallow transverse depressions on the disc; sharply striate, the striæ feebly punctate, the interstices almost flat, the propleura almost smooth. Beneath very sparsely and minutely, the sides of the meso- and metasternum coarsely, punctate. Prosternum very deeply bifoveate in front and more or less excavate in the middle before the anterior coxæ.

♂. Prosternum in the fully-developed form armed with two conical tubercles, and with a circular fovea between them; first ventral segment with a transverse, large, shallow, closely punctate, finely pilose depression in the middle behind; anterior tibiæ ciliate within, the anterior tarsi sometimes hairy.

Length $3\frac{3}{8}$ –5, breadth 2 – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Cordova (*Sallé*, *Höge*), Jalapa (*Höge*); GUATEMALA, Cubilguitz and Sinanja in Vera Paz, Cerro Zunil (*Champion*); PANAMA, Volcan de Chiriqui, 4000 feet (*Champion*).

Three males and five females. Distinguished amongst its allies by the glabrous, deeply bifoveate prosternum, the flattened, uneven, sharply striate elytra, and the ochreous or white spot on the metathoracic episterna and the first ventral segment.

4. **Cylindrocerus subulatus**, sp. n. (Tab. XIII. figg. 26, 26 a, ♀.)

Very like *C. glabripectus*, but with the ochreous scales on the under surface condensed into a single dense elongate patch on the metathoracic episterna, and those at the base of the third elytral interstice into an oblong patch; the rostrum more abruptly narrowed, and with the smooth apical portion comparatively slender, the basal portion coarsely punctate, the antennæ inserted at a little behind the middle, the antennal club more elongate, nearly as long as the funiculus; the ventral surface glabrous, and very sparsely, finely punctate throughout; the prosternum with two smaller foveæ in front and slightly depressed in the middle before the coxæ.

Length $4\frac{1}{2}$, breadth $2\frac{1}{5}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen, evidently distinct from *C. glabripectus*.

5. **Cylindrocerus squamipectus**, sp. n.

Oblong-subrhomboidal, flattened above, shining, black; an oblong spot at the base of the third elytral interstice, a spot above each anterior coxa, the middle of the prosternum, an elongate patch on the metathoracic episterna, and a rounded spot at the sides of the first ventral segment, thickly clothed with yellowish-white scales, the rest of the under surface with a few minute whitish scales. Head minutely punctate; rostrum much longer than the head and prothorax, stout and coarsely punctate in its basal half, the apical half smooth and more slender, the antennæ inserted at (♀) or a little beyond (♂) the middle, the antennal club stout, oblong-ovate, as long as joints 2-7 of the funiculus united. Prothorax conical, slightly broader than long, sparsely, minutely punctate. Elytra triangular, flattened, and with two shallow transverse depressions on the disc; sharply striate, the striae feebly punctate, the interstices flat. Beneath closely punctate, the propleura smoother. Prosternum with two deep more or less confluent foveæ in front and shallowly depressed down the middle to the anterior coxæ.

♂. Prosternum in the fully-developed form armed with two conical tubercles, and with a deep excavation between them; first ventral segment very broadly excavate in the middle.

Length $4\frac{1}{10}$ – $5\frac{1}{2}$, breadth $2\frac{1}{10}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*), Cordova (*Höge*).

Seven specimens. Very like *C. glabripectus*, but with an interrupted transverse, curved space in front of the anterior coxæ, an oblong patch on the metasternal side-pieces, and a spot at the sides of the first ventral segment, squamose; the under surface more closely punctate; the ventral depression of the ♂ larger, the anterior tibiæ not ciliate in this sex. Allied unnamed S.-American forms are contained in the British Museum collection.

6. **Cylindrocerus circumlineatus**, sp. n. (Tab. XIII. figg. 27, 27 a, ♀.)

Subovate, flattened above, shining, black; an oblong spot at the base of the third elytral interstice, a complete or more or less interrupted stripe along the sides of the body beneath, the two stripes connected across the prosternum, and the sides of the metasternum, densely clothed with rather coarse white scales, the rest of the under surface and the legs with scattered, minute, narrow scales. Head minutely punctate; rostrum long, moderately stout, becoming more slender towards the apex, finely punctate, the apical half

smooth, the antennæ inserted at about the middle, the antennal club stout, oblong-ovate, nearly as long as joints 2-7 of the funiculus united. Prothorax transverse, rounded at the sides anteriorly, strongly constricted in front, smooth. Elytra triangular, flattened on the disc, sharply striate, the striæ feebly punctate, the interstices flat. Beneath closely punctate, a broad space down the middle of the metasternum and abdomen smoother. Prosternum bifoveate in front.

♂. Prosternum armed with two short spines, and with a deep circular cavity between them; first ventral segment flattened or depressed in the middle.

♀. Prosternum unimpressed in front of the anterior coxæ.

Length 3-4, breadth $1\frac{1}{2}$ -2 millim. (♂ ♀.)

Hab. MEXICO, Toxpam (*Sallé*: ♂); GUATEMALA, Cahabon in Vera Paz (*Champion*: ♀); NICARAGUA, Chontales (*Belt*: ♂ ♀); PANAMA, Bugaba (*Champion*: ♂).

Six specimens, perhaps belonging to more than one species. The pair from Chontales may be taken as the types, and both have the white pleural band interrupted. In the two males from Bugaba this band is complete, whereas in the other four examples it is more or less wanting on the first ventral segment. The single male from Mexico has a deeper ventral depression than the others. The prothorax is more constricted in front and more rounded at the sides than in the allied forms.

7. *Cylindrocerus longipennis*, sp. n. (Tab. XIII. fig. 28, ♀.)

Elongate-rhomboidal, flattened above, shining, black; the elytra with a dense rounded patch of elongate, narrow, whitish scales at the base of the third interstice, the rest of the surface almost bare. Head closely punctate; rostrum longer than the head and prothorax, rather slender, thickened and closely punctate towards the base, the apical half smooth, the antennæ inserted at about the middle, the antennal club oblong-ovate, stout, as long as joints 2-7 of the funiculus united. Prothorax conical, broader than long, rather strongly constricted in front; sparsely, minutely punctate. Elytra about two and one-third times the length of the prothorax, triangular, here and there transversely depressed on the disc, the humeri rounded; deeply striate, the striæ feebly punctate, the interstices smooth and flat. Beneath somewhat closely, the sides of the meso- and metasternum more coarsely and densely, punctate. Prosternum deeply bifoveate in front and broadly depressed thence to the anterior coxæ, the latter rather narrowly separated. Posterior femora not reaching the apex of the abdomen.

Length $5\frac{1}{2}$, breadth $2\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

One specimen. The elongate, uneven elytra, the patch of white scales at the base of the third elytral interstice, the immaculate under surface, the deeply bifoveate prosternum, and the stout, oblong-ovate antennal club distinguish *C. longipennis*. The prosternal depression is shallow and without definite margin. There are a few white scales on the metathoracic episterna and the sides of the abdomen, perhaps vestiges of spots.

8. *Cylindrocerus lissonotus*, sp. n. (Tab. XIII. figg. 29, 29 a, b, ♂.)

Oblong-rhomboidal, flattened above, very shining, black; an oval spot at the base of the third elytral interstice, a curved transverse streak in front of each anterior coxa, an elongate streak on the metathoracic episterna, and a spot at the sides of the second ventral segment, thickly clothed with pure white scales, the rest of the under surface also with a few scattered smaller white scales. Head very finely punctate; rostrum longer than the head and prothorax, stout, becoming more slender and almost smooth in its

apical half, the basal half coarsely punctate at the sides, the antennæ inserted near the middle, the antennal club elongate, nearly as long as the funiculus. Prothorax conical, a little broader than long, strongly constricted in front, smooth. Elytra triangular, flattened on the disc and depressed along the suture; the sutural and marginal striæ sharply defined, the others faint or obsolete and their position indicated by rows of fine punctures, the interstices flat to near the apex. Beneath sparsely and very finely, the sides of the meso- and metasternum and of the abdomen coarsely and closely, punctate. Prosternum bifoveate in front and excavate down the middle before the anterior coxæ, the latter distant.

♂. Prosternum in the fully-developed form armed with two short spines and with a deep circular cavity between them; first ventral segment flattened and somewhat closely punctate in the middle.

Length $3\frac{1}{2}$ – $4\frac{2}{3}$, breadth $1\frac{7}{8}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpam (*Sallé*); GUATEMALA, Chacoj in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt*); COSTA RICA, Cañas Gordas (*Pittier*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Numerous examples, one only of the males having the prosternum bispinose and with a deep median excavation. The obliterated or faint dorsal striæ (the sutural one excepted), the three pure white marks at the sides of the body beneath (in addition to the one at the base of the third elytral interstice), and the elongate antennal club, readily distinguish *C. lissonotus*.

9. *Cylindrocerus glabratus*, sp. n. (Tab. XIII. figg. 30, 30 a, ♂.)

♂. Elongate-rhomboidal, flattened above, shining, black; glabrous above and beneath, a small cluster of narrow white scales at the sides of the first ventral segment excepted. Head finely punctate; rostrum very long, moderately stout and rather coarsely punctate in its basal half, the apical half much smoother and more slender, the antennæ inserted at about the middle, the antennal club nearly as long as joints 2–7 of the funiculus united. Prothorax almost as long as broad, conical, sparsely, minutely punctate, except along a narrow space down the middle. Scutellum oblong-subquadrate. Elytra triangular, flattened and with two shallow transverse depressions on the disc; sharply striate, the striæ feebly punctate, the interstices flat. Meso- and metasternum coarsely, the sides of the abdomen more finely, punctate, the rest of the under surface almost smooth. Prosternum armed with two long spines, and with a large, extremely deep, circular excavation between them, the two foveæ in front deep and coalescent. First ventral segment broadly depressed across the middle behind. Legs elongate; anterior tibiæ strongly fusco-ciliate in their apical half within; anterior tarsi with projecting fuscous hairs.

Length $5\frac{2}{3}$, breadth $2\frac{2}{3}$ millim.

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One male. This species is almost entirely glabrous, above and beneath, the legs are elongate, the prosternal cavity (♂) is very deep and large, and the spines are long, the prothorax is nearly as long as broad, &c. The anterior coxæ are separated by about the width of one of them. The prosternal excavation is deep enough to receive the antennal club.

RHIANUS.

Rhianus, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 322, 323 (1889).

Rostrum stout, arcuate; mandibles feebly notched on their inner edge; eyes separated by the width of the rostrum; antennal club large, acuminate-ovate; prothorax tubulate in front; scutellum large and

prominent, flat, widened posteriorly; elytra triangular, much wider than the prothorax, incompletely striate; pygidium not visible; prosternum unarmed, sulcate, the sulcus extending backward between the coxæ, which are separated by about one-half their own width; femora sublinear, unarmed; tibiæ angulate at their outer apical angle; tarsal claws free; body broad, convex, rhomboidal, polished, glabrous above.

Type, *R. mexicanus*, Pasc.

This genus was based by Pascoe upon an insect he supposed to be the *Centrinus mexicanus* of Boheman, but one of the characters given by him for *Rhianus*, "femora mutic," shows that he had wrongly identified the species, and this has been confirmed by a comparison of the types. The present insect has the general facies of a *Diorymerus*, and there are no other Central-American forms known to me that can be placed with it. The scutellum is unusually large and prominent.

1. *Rhianus mexicanus*. (Tab. XIII. figg. 31, 31 a.)

Centrinus (Rhianus) mexicanus, Pasc. Ann. & Mag. Nat. Hist. (6) iv. p. 323¹ (nec Boh.).

Shining, black, the antennæ and the apical joint of the tarsi obscure ferrugineous; glabrous above, the punctures of the median portion of the under surface and of the legs each bearing a hair-like scale, the lower surface of the femora and the inner edge of the tibiæ finely ciliate. Head transversely depressed between the eyes; rostrum a little longer than the head and prothorax, stout, thickened at the base, punctured to the tip, the antennæ inserted far behind the middle, the club long, stout, and acuminate, as long as joints 2-7 of the funiculus united. Prothorax moderately convex, the sides arcuately converging from the base to the narrow tubulate anterior portion, the base subfoveate on each side of the median lobe; the surface with very minute widely scattered punctures. Scutellum smooth, bare. Elytra with the striæ almost obsolete on the outer part of the disc from a little below the base, the three inner ones sharply defined, becoming much deeper anteriorly, the interstices smooth. Beneath somewhat closely punctate down the middle, the punctuation becoming much sparser towards the sides, the fifth ventral segment slightly depressed along the centre.

Length 6, breadth 4 millim. (♂?)

Hab. MEXICO (coll. Pascoe, in Mus. Brit.).

One specimen. Very like *Centrinus mexicanus*, Boh., here referred to *Diastethus*, but with a longer scutellum, sublinear, unarmed femora, and free tarsal claws. The locality requires confirmation.

RHIANINUS, gen. nov.

Rostrum strongly arcuate, stout; mandibles straight on their inner edge, not decussate; antennal club ovate; eyes ascending, narrowly separated above; prothorax tubulate in front; scutellum transverse, free, densely squamose; elytra much wider than the prothorax, triangular, deeply striate, depressed along the suture; pygidium not visible; prosternum unarmed, narrowly sulcate; anterior coxæ separated by about one-third of their own width; femora linear, unarmed; tarsal claws free; body rhomboidal, polished, glabrous above, the scutellum excepted.

Type, *R. niveiscutum*.

The type of this genus is very like *Rhianus mexicanus*, Pasc., but cannot be satisfactorily treated as congeneric with it; *R. carinirostris* is a diminutive allied form.

1. *Rhianinus niveiscutum*, sp. n. (*Rhianus niveiscutum*, Tab. XIII. figg. 32, 32 a.)

Oblong-subrhomboidal, shining, black, the antennæ and the tip of the rostrum ferruginous in one specimen; the scutellum densely albo-squamose, the rest of the upper surface bare, the entire under surface thickly set with small, narrow, hair-like, white scales. Head closely punctate; eyes separated by about one-half the width of the rostrum; rostrum strongly arcuate, not longer than the head and prothorax, very stout and gibbous at the base, flattened at the apex, the basal half tricarinate and closely punctate, the apical portion flattened and very sparsely punctured; antennæ with joints 2-7 of the funiculus short, the club ovate, small. Prothorax gradually narrowing to the short, tubulate anterior lobe; very sparsely, finely punctate. Scutellum large, transversely subquadrate. Elytra triangular, long, slightly depressed along the suture, the humeri swollen; sharply striate throughout, the striæ feebly punctate, the interstices flat and almost smooth. Beneath closely punctate. Presternal sulcus narrow, continued between the narrowly-separated anterior coxæ.

Length $5\frac{1}{2}$ - $5\frac{3}{4}$, breadth $3\frac{1}{8}$ - $3\frac{1}{2}$ millim. (♀?)

Hab. GUATEMALA, Senahu in Vera Paz (*Champion*).

Two specimens. Narrower than *Rhianus mexicanus*, the scutellum densely squamose, the elytra sharply striate throughout, the under surface closely punctate and finely squamose, the antennal club small, the eyes separated by about one-half the width of the rostrum, the rostrum itself more flattened at the tip and tricarinate in its basal half.

2. *Rhianinus carinirostris*, sp. n.

Subrhomboidal, rather narrow, shining, black; the scutellum albo-squamose, the under surface and legs clothed with small, narrow, white scales. Head closely punctate, feebly sulcate between the large, narrowly separated eyes; rostrum stout, flattened at the apex, about as long as the head and prothorax, closely punctate, a smooth space along the middle of the apical half excepted, sharply carinate on each side to the tip. Prothorax transverse, subconical, strongly constricted in front; very sparsely, minutely punctate. Scutellum small, transversely subquadrate. Elytra subtriangular, narrowing from the base, strongly depressed along the whole length of the suture, the humeri not prominent; sharply and deeply striate, the striæ faintly punctate, the interstices smooth and flat. Beneath closely punctate.

Length 3, breadth $1\frac{3}{8}$ millim.

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. Very much smaller than the Guatemalan *R. niveiscutum*, the eyes subcontiguous, the rostrum carinate on each side to the tip, the elytra shorter, with the suture more depressed and the humeri less prominent.

PSEUDORHIANUS, gen. nov.

Rostrum arcuate, stout; mandibles feebly notched on their inner edge, short, slightly decussate when closed; antennal club ovate; eyes separated above by the width of the rostrum; prothorax tubulate in front; scutellum small, transverse, free; elytra triangular, much wider than the prothorax, deeply striate; pygidium not visible; presternum unarmed, broadly and shallowly sulcate, the sulcus limited on each side anteriorly by a distinct ridge; ventral segments 1 and 2 connate at the middle; femora subclavate, unarmed, the anterior and intermediate pairs dilated at the outer apical angle; tarsal claws long, free; body rhomboidal, polished, almost glabrous above.

Type, *Ps. impressus*.

This genus is based upon a Mexican insect with a peculiar sexual distinction in the male. The Costa Rican *R. compressirostris* has the rostrum strongly compressed and abruptly separated from the head, and the anterior coxæ much more approximate, but it can be included here for the present. *Centrinus conformis* and *C. ruficornis*, Boh., and other S.-American forms may have to be included under *Pseudorhianus*.

1. *Pseudorhianus impressus*, sp. n. (*Rhianus impressus*, Tab. XIII. figg. 33, 33 a, ♂.)

Centrinus (Baris) impressus, Sturm, in coll. Sallé (nec Kirsch).

♂. Oblong-rhomboidal, shining black, glabrous above, the punctures of the under surface each bearing a whitish hair. Head closely, finely punctate; rostrum strongly arcuate, long, stout, flattened towards the tip, thickly, rather coarsely punctate, subcarinate at the base, the antennæ inserted far behind the middle, joint 2 of the funiculus nearly as long as 1, the club ovate. Prothorax arcuately narrowing from the base, strongly constricted in front; finely, somewhat closely punctate, a narrow smooth space down the middle excepted. Scutellum small, transverse. Elytra rather long, subtriangular, with the humeri swollen and somewhat projecting; deeply striate throughout, the striæ feebly punctate, the interstices very sparsely, minutely punctate, almost flat, subcostate at the apex, the disc transversely depressed below the base, near the middle, and at about one-third from the apex. Beneath sparsely, finely punctate; prosternum with a broad, shallow, sharply margined sulcus, the smooth, flat intercoxal portion furnished with a dense pencil of long erect ochreous hairs in the centre; anterior coxæ separated by more than their own width. Femora subclavate, unarmed. Tibiæ all more or less hollowed and ciliate in their apical half within. Tarsi rather slender.

♀. Rostrum longer, cylindrical, almost smooth, except at the base; prothorax subconical, more closely punctate; anterior coxæ more approximate; tibiæ slightly sinuate on their inner edge.

Length 5-6, breadth $2\frac{3}{4}$ - $3\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Sallé, ex coll. Sturm, and Truqui in coll. Fry: ♂*), Panistlahuaca in Oaxaca (*Sallé: ♀*).

Two males and one female. The pencil of long hairs on the prosternum between the anterior coxæ is a remarkable male-character in this species.

2. *Pseudorhianus compressirostris*, sp. n. (Tab. XIV. figg. 1, 1 a.)

Oblong-subrhomboidal, robust, shining, fusco-castaneous, the head, rostrum, prothorax, femora, and tibiæ nigro-piceous; the prothoracic punctures and those along the elytral interstices each bearing a semierect, pallid seta, the under surface and legs sparsely clothed with long pallid bristly hairs. Head finely punctate, with a deep transverse sulcus between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, the basal half gibbous, compressed, and broadly sulcate on each side, the sides angulate at the base beneath, sparsely, finely punctate, the antennæ inserted at a little behind the middle, joint 1 of the funiculus elongate, 2 much longer than 3, the club ovate. Prothorax broader than long, subconical, strongly constricted in front; with coarse scattered punctures, a space along the middle impunctate. Scutellum transverse, trapezoidal. Elytra much wider than the prothorax, narrowing from the base, the disc transversely depressed at the base and beyond the middle; punctate-sulcate, the interstices convex and each with a widely-scattered series of coarse scattered setigerous punctures. Beneath sparsely punctate. Prosternum broadly and shallowly sulcate anteriorly and with a smooth transverse cavity in the apical constriction. Mesosternum depressed. Anterior coxæ narrowly separated.

Length $5\frac{1}{4}$, breadth $2\frac{4}{5}$ millim. (♀?)

Hab. COSTA RICA (*Biolley, in coll. Solari*).

One specimen, doubtless somewhat immature. An isolated form, with the rostrum sharply separated from the head above and beneath, gibbous, and broadly excavate at the sides; the prothorax with coarse scattered punctures; the anterior coxæ narrowly separated; the upper surface very sparsely setose.

LAMPROBARIS, gen. nov.

Rostrum strongly arcuate from the base, cylindrical, at least one-half the length of the body, the antennæ inserted at (♀) or beyond (♂) the middle, the antennal club oblong-ovate and acuminate; mandibles short, slightly notched on their inner edge, feebly decussate; prothorax conical, tubulate in front, the upper anterior portion subcucullate; scutellum small, free; elytra triangular, much wider than the prothorax, flattened on the disc, abruptly sulcate on the apical declivity; pygidium not visible; prosternum bispinose and often excavate in the ♂, flattened or shallowly excavate in the ♀; ventral segments 1 and 2 connate at the middle; anterior coxæ separated by about half their own width; femora feebly clavate, unarmed; tibiæ and tarsi rather slender, the lobes of the third tarsal joint narrow, the tarsal claws long and divergent; body rhomboidal, polished, glabrous above and beneath.

Type, *L. cucullatus*.

Two closely allied forms are referred to this genus. Both have the elytra abruptly sulcate at the apex (as in *Lissobaris nigropiceus*); the legs long and rather slender, smooth or sparsely punctate; and the short tubulate portion of the prothorax somewhat produced over the head above.

1. *Lamprobaris cucullatus*, sp. n. (Tab. XIV. figg. 2, 2 a, ♂.)

Rhomboidal, ferruginous, shining. Head minutely punctate; rostrum reaching nearly or quite to the apex of the metasternum, finely punctate, smoother along the middle. Prothorax transverse, narrowed from the base, smooth. Scutellum somewhat rounded, flat. Elytra rapidly narrowed from the base, conjointly rounded at the apex, with smooth, somewhat swollen humeri; sharply striate, the striæ obsoletely or feebly punctate, the interstices smooth, flat on the disc and strongly convex on the apical declivity. Prosternum and propleura smooth, the rest of the under surface sparsely punctate. Legs almost smooth.

♂. Prosternum armed with two spines of variable length, and in fully-developed examples with a very deep excavation between them; first ventral segment slightly depressed down the middle.

Length 3-3½, breadth 1½-2 millim. (♂ ♀.)

Hab. GUATEMALA, Sinanja and Purula in Vera Paz, Cerro Zunil (*Champion*: ♂ ♀); PANAMA, Bugaba (*Champion*: ♀).

Eight specimens, the single specimen (♀) from Panama having the rostrum black at the apex, and also longer and more closely punctate than in those of the same sex from Guatemala.

2. *Lamprobaris rufonotatus*, sp. n. (Tab. XIV. figg. 3, 3 a, ♂.)

Rather elongate, rhomboidal, shining, black, the anterior lobe of the prothorax, a humeral spot and a large apical patch on the elytra, the antennæ, prosternum, prosternal spines, tibiæ, tarsi, and base of the femora, rufous or ferruginous, the head and rostrum rufo-piceous. Head very minutely punctate; rostrum reaching the apex of the metasternum, punctured at the sides, smooth along the middle.

Prothorax very little broader than long, the anterior lobe arcuately produced in the middle, smooth. Elytra sharply striate, the striæ feebly punctate, the interstices flat on the disc and sharply raised on the apical declivity. Prosternum and propleura smooth, the rest of the under surface very sparsely punctate. Legs sparsely punctate.

♂. Prosternum armed with two long spines and with a very deep excavation between them; first ventral segment slightly depressed down the middle.

Length 4, breadth 2 millim. (♂.)

Hab. GUATEMALA, Sinanja in Vera Paz (*Champion*).

One male. Larger and more elongate than *L. cucullatus*, the elytra black, with a shoulder-spot and a large apical patch rufous, the prothorax longer and more produced over the head, the elytral interstices more sharply raised at the apex, the legs sparsely punctured.

PLATYBARIS, gen. nov.

Rostrum stout, arcuate; mandibles straight on their inner edge, pointed, free; antennal club short-ovate; prothorax tubulate in front, deeply sinuate at the base; scutellum free, small, subcordate, flattened; elytra rounded-triangular; pygidium not visible; prosternum without definite groove, the intercoxal portion tumid; anterior coxæ small, separated by about their own width; femora unarmed; anterior tibiæ with a lamelliform prominence on the inner edge in the ♂; tarsal claws free; body broad, rhomboid-elliptic, polished and glabrous above.

Type, *P. lamellifer*.

This genus is based upon a single species from Mexico. It is one of those Centrini-forms, like the N.-American *Pachybaris*, that has wholly the facies of the numerous genera with completely exposed pygidium. The armature of the anterior tibiæ of the male is different from that of any Barid known to me, the triangular lamelliform tooth being placed nearer the apex than in the few species possessing this character.

1. *Platybaris lamellifer*, sp. n. (Tab. XIV. figg. 4, 4 a, b, ♂.)

Broad, flattened above, shining, black, the elytra and antennæ piceous; the under surface and legs sparsely clothed with small, cinereous, hair-like scales, the upper surface bare. Head finely punctate, transversely grooved between the eyes; rostrum curved, stout, about as long as the head and prothorax, thickly punctate, the antennæ inserted near the middle, joint 1 of the funiculus as long as 2-5 united; eyes strongly transverse. Prothorax broader than long, arcuately narrowing from the deeply sinuate base, strongly constricted and tubulate in front; sparsely, finely punctate, except along a narrow space down the middle, the punctuation becoming closer and coarser towards the sides and on the flanks. Elytra a little wider than the prothorax, narrowing from the rounded humeri, the disc transversely depressed at and below the base; with narrow, sharply-cut, finely punctured striæ, the interstices flat, broad, and very sparsely, minutely, subseriately punctate. Beneath closely punctate. Prosternum slightly depressed anteriorly. Metasternum and first ventral segment shallowly sulcate down the middle. Legs short; anterior tibiæ with an angular, corneous, rufo-testaceous, lamelliform prominence on the inner edge towards the apex (fig. 4 b), the intermediate pair hollowed on the inner side at the tip.

Length $5\frac{1}{2}$, breadth 3 millim. (♂.)

Hab. MEXICO, ? Sierra de Durango (*Höge, in coll. Solari*).

One specimen. A broad, flattened form, glabrous above, with the elytral striæ narrow and the interstices very broad.

DIORYMEROPSIS, gen. nov.

Rostrum arcuate; mandibles slightly notched on their inner edge, not or feebly decussate; antennal club ovate; prothorax more or less tubulate in front; scutellum small, free; elytra much wider than the prothorax, triangular or subtriangular, sharply striate; pygidium not visible; prosternum unarmed, with a parallel-sided or anteriorly-widened sulcus extending backward between the coxæ, the median basal portion broadly produced and partly covering the mesosternum; femora unarmed, more or less sulcate beneath; anterior tibiæ excavate at the apex externally for the reception of the base of the retractile tarsus; tarsal claws small, free or subconnate at the base; body rhomboid-ovate or rhomboidal, polished, glabrous or clothed with scattered scales above.

Type, *D. disjunctus*.

Four species are included in this genus—two (*D. disjunctus* and *D. piceicollis*) with the prosternal sulcus parallel-sided and two (*D. cavimanus* and *D. uncatus*) with the sulcus narrowed posteriorly*. *Diorymeropsis* bears a certain relationship to *Zygobaris* and its allies, all of which have connate tarsal claws.

1. *Diorymeropsis disjunctus*, sp. n. (Tab. XIV. figg. 5, 5 a, ♂.)

Rhomboid-ovate, shining, black; the elytra and the lateral portions of the prothorax with widely-scattered, elongate, narrow, white scales, which become a little more crowded at the base of the first and second elytral interstices, the under surface and legs more thickly clothed with small narrow white scales; the sides of the prothorax anteriorly, pro- and mesopleura, rostrum, and anterior femora in front, with numerous intermixed coarser ochreous scales in the ♂. Head with minute scattered punctures, transversely sulcate between the eyes; rostrum (♀) arcuate, stout, slightly thickened towards the base, about as long as the head and prothorax, closely punctate, smooth along the middle, the scrobes extending forward to near the tip, (♂) stouter, squamose, rugulosely punctate and finely carinate; antennæ inserted behind the middle of the rostrum in both sexes, the outer joints of the funiculus transverse, the club ovate. Prothorax transverse, narrowing from the base, strongly constricted in front, the sides rounded anteriorly; very sparsely punctate, the punctures becoming coarser and more crowded laterally. Scutellum oblong. Elytra wider than the prothorax, rounded-triangular, slightly depressed along the suture; sharply striate, the striæ feebly punctate, the interstices broad, flat, finely and irregularly uniseriate-punctate. Beneath closely and coarsely, the ventral segments more sparsely, punctate. Prosternal excavation narrow, parallel-sided, extending as far as the hind margin of the anterior coxæ. Legs short, closely punctate; femora sulcate beneath; anterior tibiæ hollowed at the apex externally, finely ciliate within in the ♂; tarsal claws small, free.

Length 3-3½, breadth 1½-2⅓ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

Eight specimens, one only of which is a male. The scattered, elongate, adpressed white scales on the elytra are very conspicuous in this insect, and the sexual differences in the vestiture of the rostrum and propleura are characteristic.

2. *Diorymeropsis piceicollis*, sp. n.

Subrhomboidal, shining, black, the prothorax piceous; the under surface and legs sparsely clothed with minute, hair-like, white scales, the first elytral interstice with a short line of similar scales at the base. Head minutely punctate, transversely grooved between the eyes; rostrum stout, arcuate, scarcely longer than the prothorax, thickly punctate, the antennæ inserted at the middle. Prothorax broader than long, rapidly narrowed from the base, strongly constricted in front; sparsely, minutely punctate, the punctures becoming coarse and crowded on the flanks. Scutellum very small, subquadrate. Elytra subtriangular,

* *Pachybaris wanthorpyli*, Linell, from Texas, is nearly related to *D. disjunctus* and it will probably have to be included in *Diorymeropsis*.

rapidly narrowing from the base, the humeri somewhat swollen; sharply striate, the striae obsolete punctate, the interstices broad, flat, faintly uniseriate-punctate. Beneath coarsely and closely, the ventral segments more sparsely, punctate. Prosternal excavation parallel-sided. Femora sulcate beneath. Tarsal claws subconnate at the base.

Length $3\frac{1}{8}$, breadth 2 millim. (σ ?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Very near *D. disjunctus*, and with the prosternum similarly sulcate and produced, but wanting the coarse scattered elongate scales on the elytra, the prothorax less rounded at the sides, the rostrum much shorter and stouter, the tarsal claws subconnate at the base.

3. *Diorymeropsis cavimanus*, sp. n.

Rhomboidal, rather narrow, shining, black; the prothorax at the sides, the elytra, under surface, and legs sparsely clothed with hair-like white scales, the scales on the elytra rather long and actiform, uniseriately arranged down each interstice and clustered into a short oblique streak at the base of the third. Head finely punctate, transversely grooved between the eyes; rostrum very stout, a little longer than the prothorax, strongly arcuate, thickly punctate, striate at the sides. Prothorax transverse, subconical, strongly constricted in front; sparsely, coarsely punctate, smooth along the median line. Scutellum oblong. Elytra much wider than the prothorax, subtriangular; sharply striate, the striae obsolete punctate, the interstices broad, flat, and very finely uniseriate-punctate. Beneath closely and coarsely, the ventral segments much more finely, punctate, the first segment depressed down the middle in the σ . Prosternal sulcus deep and sharply defined, becoming narrower and shallower between the coxae. Anterior femora shallowly, the others deeply, sulcate beneath. Anterior tibiae with a long, the other tibiae with a shorter, apical uncus, the anterior pair hollowed at the apex and also shallowly sulcate externally; tarsal claws subconnate at the base.

Var. The hair-like white scales on the elytra wanting on the basal half, except at the base of the third interstice. Length $2\frac{1}{4}$ – $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (σ ♀).

Hab. GUATEMALA, San Gerónimo (*Champion*: σ); PANAMA, Volcan de Chiriqui 3000 feet (*Champion*: σ ♀).

Five specimens. Smaller and narrower than *D. disjunctus*, the rostrum shorter, stouter, and more curved, the setiform scales on the elytra finer, the prosternal cavity narrowed behind and deeper in front, the anterior tibiae hollowed for some distance externally for the reception of the base of the tarsi in repose. The varietal form, represented by a single male, is from Guatemala.

4. *Diorymeropsis uncatatus*, sp. n.

Rhomboid-ovate, shining, black, the base of the antennae and the tarsi more or less ferruginous; almost glabrous above, the under surface and legs sparsely clothed with minute, narrow, whitish scales. Head minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, about as long as the head and prothorax, thickly punctate, striate at the sides. Prothorax transverse, convex, rounded at the sides, narrowed and strongly constricted in front; coarsely, closely punctate. Scutellum small. Elytra somewhat triangular, depressed along the suture at the base; punctate-striate, the interstices flat, faintly uniseriate-punctate. Beneath coarsely and closely, the ventral segments 3 and 4 more sparsely, punctate, the first segment hollowed down the middle in the σ . Prosternum with a deep sulcus, which is narrowed between the coxae, the basal portion broad and covering the mesosternum. Anterior tibiae in the σ strongly, and in the ♀ more feebly, unguiculate at the apex; tarsal claws subconnate at the base.

Length 2 – $2\frac{1}{10}$, breadth $1\frac{1}{10}$ – $1\frac{1}{8}$ millim. (σ ♀).

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2 KK

Hab. GUATEMALA, Zapote, San Gerónimo (*Champion*); NICARAGUA, Managua (*coll. Solari*).

Two males and three females. A minute, rhomboid-ovate, shining black, almost glabrous form, with a coarsely punctured, convex prothorax, and subtriangular, punctate-striate elytra, the anterior tibiae with a long apical hook in the male.

CHÆTOBARIS, gen. nov.

Rostrum arcuate, cylindrical, very stout; mandibles short, toothed on their inner edge; antennal club ovate, the funiculus slender; prothorax tubulate in front, deeply bisinuate at the base; scutellum transversely quadrate, flat, free; elytra subtriangular; pygidium not visible; prosternum unarmed, with a broad, smooth, shallow sulcus extending down its entire length, the sulcus limited on each before and between the coxae by an acute ridge, the coxae separated by about their own width; mesosternum exposed; legs very short; femora feebly clavate, unarmed; tibiae strongly unguiculate; tarsal claws divergent; body broad, short-ovate, polished, setose.

Type, *Ch. nigrosetosus*.

This genus is related to *Rhianus*. It is one of the few Central-American Barids with conspicuously setose upper surface and legs.

1. *Chætobaris nigrosetosus*, sp. n. (Tab. XIV. figg. 6, 6 a, ♀.)

Shining, black, the antennae ferruginous at the base; the upper surface clothed with scattered, long, erect, fine, blackish setae, the under surface with cinereous hairs, the legs setose. Head transversely depressed between the eyes, closely punctate above; rostrum about as long as the prothorax, sparsely punctate, the antennae inserted behind the middle. Prothorax broad, transverse, much rounded at the sides anteriorly, the short anterior lobe narrow, very sparsely punctate. Elytra about twice as long as, and a little wider than, the prothorax, conjointly rounded at the apex, the humeri oblique and rather prominent; sharply striate, the striae distinctly punctate, the interstices broad, flat, uniseriate-punctate. Beneath and the legs sparsely punctate, the prosternum with the depressed median space smooth and shining throughout; first ventral segment excavate down the middle in the ♂.

Length $3\frac{1}{2}$ – $3\frac{3}{4}$, breadth $2\frac{1}{8}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Caldera in Chiriqui 1200 feet (*Champion*).

Three specimens. In this insect the scattered punctures on the prothorax and elytral interstices each bear a long, erect, fine, blackish seta.

ELLIPTOBARIS, gen. nov.

Rostrum arcuate, abruptly separated from the head above; mandibles slightly notched within, not decussate; antennal club ovate, the funiculus widening outwards; prothorax tubulate in front; scutellum small, free; elytra somewhat oval, the humeri oblique, not prominent, and forming an almost continuous outline with the sides of the prothorax; pygidium not visible; prosternum unarmed, with a broad, shallow, flattened sulcus, extending backward between the coxae, and limited on each side by an oblique ridge; legs short; femora unarmed, sulcate at the apex only beneath; tarsal claws free; body elliptic or rhomboid-elliptic, polished, clothed with a few scattered setiform scales.

Type, *E. setulosus*.

This genus includes two closely allied forms from Panama, both of which have deeply sulcate elytra, with the humeri not at all prominent and almost in a line with the sides of the prothorax. *Elliptobaris* approaches *Chætobaris*, but it has more the facies of the N.-American *Idiostethus tubulatus*.

1. *Elliptobaris setulosus*, sp. n. (Tab. XIV. figg. 7, 7a, ♂.)

Elliptic, somewhat flattened above, shining, black, the tips of the tarsi ferruginous; the prothorax set with long, fine, scattered, pallid, erect setæ, the elytral interstices each with a scattered line of coarser, semierect, yellowish-white setæ; the under surface and legs very sparsely clothed with fine, hair-like, white scales. Head with a deep transverse groove between the eyes; rostrum moderately stout, slightly longer than the head and prothorax, punctate-striate, in the ♀ a little longer and more sparsely punctate; antennæ with joint 2 of the funiculus as long as 3 and 4 united, the club ovate. Prothorax transverse, gradually narrowing from the base, strongly and abruptly constricted in front; closely (in the ♀ more sparsely) punctate, except along a narrow space down the middle, the punctures becoming coarser towards the sides. Scutellum transverse, broadly truncate behind. Elytra considerably wider than the prothorax, rather long, the humeri not prominent; deeply sulcate, the sulci feebly punctate, the interstices somewhat convex, rather broad, each with a widely scattered series of coarse setigerous punctures and a few irregularly-distributed minute punctures between them. Beneath very sparsely, in the ♂ more closely, punctate. Prosternal sulcus terminating in a transverse cavity in front, closely punctured between the coxæ in the ♂, polished and very sharply defined in the ♀. Anterior coxæ separated by a little less than their own width. First ventral segment depressed down the middle in the ♂.

Length $4-4\frac{1}{2}$, breadth $2\frac{1}{2}-2\frac{3}{4}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

One male and two females.

2. *Elliptobaris nudicollis*, sp. n.

Rhomboid-elliptic, somewhat flattened above, shining, black, the tips of the tarsi ferruginous; the elytral interstices each with a widely-scattered series of semierect pallid setæ, the under surface and legs with scattered, minute, hair-like, white scales. Head with a deep transverse groove between the eyes; rostrum stout, strongly arcuate, not longer than the head and prothorax, sparsely punctate. Prothorax transverse, narrowing from the base, strongly and abruptly constricted in front; sparsely, very finely punctate, the punctures becoming coarser at the sides, bare. Scutellum small, trapezoidal. Elytra moderately long, with the sides at the base forming an almost continuous outline with those of the prothorax; deeply punctato-sulcate, the interstices towards the sides and apex convex and not wider than the striæ, flatter and broader on the disc, sparsely, minutely punctate and with a widely scattered series of coarser setigerous impressions. Beneath sparsely punctate. Prosternum as in *E. setulosus*. Anterior coxæ separated by fully their own width.

Length $3\frac{1}{2}-4$, breadth $1\frac{5}{8}-2\frac{1}{8}$ millim. (♀ ?)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Four specimens. A little less elongate than *E. setulosus*, the rostrum shorter, stouter, and more curved, the prothorax finely punctate and bare, the elytra more rounded at the sides and with fewer setæ.

ACANTHOBARIS, gen. nov.

Rostrum (♂) stout and arcuate, (♀) stout to about the basal third, with the apical portion longer, straighter, and more slender than in the ♂; mandibles short, blunt at the tip, rounded externally, straight on their inner edge when closed; antennal club short-ovate, the basal joint sparsely pilose; prothorax tubulate in front, deeply bisinuate at the base; scutellum small, transverse, free; elytra triangular; pygidium hidden; prosternum unarmed, narrowly sulcate; anterior coxæ separated by about one-third their own width; legs stout; femora unarmed, the intermediate and posterior pairs feebly sulcate beneath; all the tibiae acutely dilated on their outer edge near the base and at the apex; tarsal claws very small, connate at the base; body convex, rhomboidal, polished, almost bare above.

Type, *A. castaneipennis*.

This genus includes a single species from Panama. It has the tibiæ formed as in *Pseudoptatus* (and in most of the *Diorymeri*), but is best placed amongst the Centrinides, near *Rhianus*.

1. ***Acanthobaris castaneipennis***, sp. n. (Tab. XIV. figg. 8, 8a, ♂.)

Shining, black, the elytra castaneous or fusco-castaneous; the under surface and legs somewhat thickly clothed with small, hair-like, cinereous scales, the median lobe of the prothorax with two dense clusters of similar scales, the rest of the upper surface almost bare. Head sparsely punctate, transversely depressed between the eyes; rostrum about as long as the head and prothorax, a little shorter in the ♂, rugosely punctate, the flattened apical portion in the ♀ smoother, the antennæ inserted towards the base in both sexes, the joints of the funiculus becoming wider outwards. Prothorax transverse, subconical, constricted in front; sparsely punctate, the punctures becoming coarser and closer at the sides and along the basal margin. Scutellum concave. Elytra a little wider than the prothorax, punctato-sulcate, the interstices subseriate-punctate, becoming narrow and convex towards the apex. Beneath and the legs closely, rather coarsely punctate, the ventral segments 3 and 4 smoother.

Length 3, breadth $1\frac{3}{4}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One male and two females.

DIORYMERELLUS, gen. nov.

Rostrum strongly arcuate, moderately stout; mandibles short, decussate at the tip; antennal club ovate; prothorax more or less tubulate in front; scutellum free, transverse or subquadrate; elytra much wider than the prothorax, triangular or subtriangular, with one or more of the dorsal striæ obliterated; pygidium not visible; prosternum unarmed, with a smooth deep excavation or sulcus, limited on each side by an oblique ridge and extending backward between the anterior coxæ; femora not or feebly sulcate beneath, unarmed; tarsal claws small, more or less connate at the base, free in *D. histeroides*; body rhomboidal, polished, glabrous above.

Type, *D. lævipennis*.

The seven species referred to this genus, all of which are unique, have the general facies of the smaller *Diorymeri*, from which they differ in the less retractile legs, not or imperfectly sulcate femora, less convex form, &c. The tibiæ are narrow and without trace of angulation near the base externally. *Diorymerellus* includes various unnamed S.-American forms standing under *Diorymerus* in collections, and at least one species from the Antilles*. *Centrinopsis*, Røelofs, from Japan, is closely related to it.

* *Diorymerellus obliteratus*, sp. n.—Short-ovate, shining, black, almost glabrous, above and beneath; the entire upper surface smooth, the under surface (the ventral segments 2–4 excepted) with coarse scattered punctures. Elytra compressed at the sides opposite the posterior coxæ, the marginal stria alone traceable. Metathoracic episterna extremely narrow. Rostrum a little longer and more flattened at the tip in the ♀ than in the ♂. First ventral segment hollowed in the middle in the ♂. Tarsal claws minute, connate.—Length 2– $2\frac{1}{2}$, breadth $1\frac{1}{5}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. ANTILLES, St. Vincent (*H. H. Smith, in Mus. Brit.*).

Six specimens. Smaller and narrower than *D. lævipennis*; elytra less rounded at the sides, black, and with the sutural stria obliterated. There is a closely allied unnamed form from Vera Cruz, Mexico, in the U.S. National Museum.

The Central-American species may be grouped thus:—

Elytra each with one (sutural) stria	<i>lævipennis</i> .
„ „ four dorsal striæ	<i>octostriatus</i> .
„ „ five „ „	<i>decemstriatus</i> .
„ „ six „ „	<i>12-striatus, castaneicolor, rubripennis, histeroides</i> .

1. *Diorymerellus lævipennis*, sp. n. (Tab. XIV. figg. 9, 9 a.)

Short-ovate, rather broad, shining, black, the elytra rufous; glabrous. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, moderately stout, about as long as the prothorax, very sparsely, minutely punctate, the antennæ inserted at the middle, the antennal club ovate. Prothorax transverse, strongly constricted in front, the sides arcuately converging from the base and forming an almost continuous outline with those of the elytra, the surface with very minute scattered punctures. Scutellum subquadrate. Elytra broad, slightly depressed along the suture, the sutural and the two marginal striæ only distinct, the others indicated by faintly impressed lines, the interstices smooth and flat. Beneath sparsely, coarsely punctate, the propleura and intermediate ventral segments almost smooth. Prosternum with a broad deep transverse excavation, which extends backward to the base. Anterior coxæ separated by their own width. Tarsal claws minute, narrowly separated.

Length 3, breadth 2 millim.

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. The comparatively small prothorax, the almost smooth, rufous elytra, with the sutural stria only distinct above, and the broadly and deeply excavate prosternum, distinguish *D. lævipennis*.

2. *Diorymerellus octostriatus*, sp. n.

Rhomboidal, narrow, convex, shining, the antennæ ferruginous at the base; glabrous above, the under surface and legs with scattered minute whitish scales. Head closely punctate, unimpressed between the eyes; rostrum stout, strongly arcuate, about as long as the prothorax, closely punctate; antennal club oblong-ovate. Prothorax transverse, conical, constricted in front, with extremely minute scattered punctures and a row of coarser punctures along the apical constriction. Scutellum subquadrate. Elytra much wider than the prothorax, triangular; each elytron with four obsolete punctured sharply-cut striæ on the disc and two marginal ones beneath, the fifth reduced to a short deep stria at the base, the others obsolete or indicated by faintly-impressed fine lines, the interstices flat. Beneath closely, the ventral segments 1-4 very sparsely and finely, punctate, the first segment sulcate down the middle. Prosternum with a deep subtriangular excavation. Femora shallowly sulcate beneath. Tarsal claws very small, subconnate at the base.

Length 2, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. GUATEMALA, Coban in Vera Paz (*Champion*).

One specimen. A little more elongate than *D. decemstriatus*, the fifth elytral stria reduced to a short line at the base, the rostrum more strongly arcuate. The elytra are narrower than in *D. castaneicolor*.

3. *Diorymerellus decemstriatus*, sp. n.

Rhomboidal, narrow, shining, black; glabrous, above and beneath. Head finely punctate, foveate between the eyes; rostrum cylindrical, moderately curved, rather slender, reaching to near the apex of the metasternum, very sparsely, minutely punctate, the punctures coarser at the sides, the antennæ inserted

at a little behind the middle, the antennal club oblong-ovate. Prothorax transverse, conical, strongly constricted in front, smooth, slightly depressed at the base on each side of the median lobe. Scutellum transverse. Elytra rather long, triangular, the humeri rounded; each elytron with five faintly punctate, sharply-cut striae on the disc and two incomplete marginal ones beneath, the sixth, seventh, and eighth obliterated, the interstices broad, smooth, and flat. Meso- and metasternal side-pieces with coarse scattered punctures, the abdomen almost smooth, except at the base and apex. Prosternum deeply excavate, the sulcus limited posteriorly by a U-shaped groove between the anterior coxae. Legs moderately long; tarsal claws very small, subconnate at the base.

Length $3\frac{2}{5}$, breadth $1\frac{9}{10}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. This species has five sharply-cut striae on the disc of each elytron (one less than in *D. histerooides*), the elytra themselves are rapidly narrowed from the base, the rostrum is elongate, and the prosternal excavation is sharply margined between the coxae.

4. *Diorymerellus 12-striatus*, sp. n.

Rhomboidal, narrow, shining, nigro-piceous, the elytra fusco-castaneous; glabrous above, the under surface and legs with minute scattered whitish scales. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum arcuate, very little longer than the prothorax, stout, finely punctate, strigose at the sides. Prothorax small, transverse, subconical, strongly constricted in front; sparsely, minutely punctate, smooth along the median line. Scutellum subquadrate. Elytra much wider than the prothorax, triangular; each elytron with six narrow, feebly-punctured, sharply-cut striae and a marginal one beneath, the others obliterated, the interstices broad and flat. Beneath sparsely, the ventral segments 1-4 very finely, punctate. Prosternum deeply sulcate. Legs short; femora feebly sulcate beneath; tarsal claws minute, subconnate at the base.

Length 2, breadth 1 millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Smaller and much narrower than *D. laevipennis*, the elytra triangular and each with six striae on the disc, the prosternal cavity becoming narrower behind and not extending beyond the anterior coxae. Narrower than *D. castaneicolor*, the legs shorter, the prothorax less conical than in *D. octostriatus*.

5. *Diorymerellus castaneicolor*, sp. n. (Tab. XIV. fig. 10.)

Short-ovate, flattened above, shining, castaneous, glabrous. Head minutely punctate; rostrum strongly arcuate, moderately stout, about as long as the head and prothorax, smooth (except at the sides), the antennae inserted at about the middle, the antennal club stout, ovate, rather longer than joints 2-7 of the funiculus united. Prothorax transverse, strongly constricted in front, the sides arcuately converging from the base, almost smooth. Scutellum very small, oblong-subquadrate. Elytra broad, much wider than the prothorax, subtriangular, with the suture depressed at the base and the humeri swollen; each elytron with six sharply-cut striae on the disc and two marginal ones beneath, the seventh and eighth obliterated, the interstices broad, smooth, and flat. Meso- and metasternum closely, the ventral segments more sparsely, punctate, the propleura in great part smooth. Prosternum with a deep transverse excavation in front extending backward to the base. Anterior coxae separated by about their own width. Tarsal claws very small, connate at the base.

Length $2\frac{1}{2}$, breadth $1\frac{2}{3}$ millim.

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*).

One specimen. Recognizable by the oblong scutellum, the six sharply-cut dorsal striæ of the elytra, the somewhat swollen humeri, and the castaneous colour.

6. *Diorymerellus rubripennis*, sp. n.

Subrhomboidal, shining, nigro-piceous, the antennæ, anterior and intermediate tarsi, and hind legs obscure ferruginous, the elytra and the ventral segments 3-5 rufous; glabrous above, the under surface and legs with minute scattered scales. Head transversely grooved between the eyes; rostrum arcuate, very little longer than the prothorax, moderately stout, finely punctate, strigose and rugulose at the sides; antennal club oblong-ovate. Prothorax transverse, subconical, slightly depressed at the base on each side of the median lobe, constricted in front; smooth, the apical constriction with a transverse row of punctures. Scutellum oblong-subquadrate. Elytra wider than the prothorax, gradually narrowing from a little below the base, conjointly rounded at the apex; each elytron with six sharply-cut, obsolete punctured striæ on the disc and two marginal ones beneath, the seventh and eighth obliterated, the interstices broad, smooth, and flat. Beneath coarsely, the ventral segments 2-5 very sparsely and finely, punctate. Prosternal excavation deep, subtriangular. Anterior coxæ separated by about their own width. Legs rather slender, very short, closely punctate; intermediate and posterior femora shallowly sulcate beneath; tibiæ narrow, almost straight; tarsal claws minute, narrowly separated.

Length $2\frac{1}{8}$, breadth $1\frac{1}{3}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Much smaller than *D. histeroides*, the elytra and the apical half of the abdomen rufous, the legs shorter and much more slender. The prothorax is less constricted in front than in *D. castaneicolor*, and the head, prothorax, and legs are nigro-piceous. The hinder femora are shallowly sulcate beneath, much as in *Diorymerus*.

7. *Diorymerellus histeroides*, sp. n. (Tab. XIV. fig. 11.)

Subovate, somewhat flattened above, shining, black, the apical two-thirds of the elytra rufous, the base of the antennæ ferruginous; glabrous, above and beneath. Head almost smooth, transversely grooved and foveate between the eyes; rostrum moderately stout, arcuate, about as long as the prothorax, sparsely, finely punctate, the antennæ inserted at the middle, the antennal club ovate. Prothorax transverse, with the sides arcuately converging from the base, strongly constricted in front, smooth. Scutellum smooth and flat, transversely subquadrate. Elytra gradually narrowing from a little below the base, the humeri rounded and not prominent; each elytron with six sharply-cut, finely-punctured striæ on the disc and two marginal ones beneath, the seventh and eighth obliterated, the interstices broad, smooth, and flat. Beneath very sparsely and finely, the meso- and metasternal side-pieces coarsely and closely, punctate. Prosternum deeply excavate, the sulcus limited posteriorly by a U-shaped ridge between the coxæ. Legs short; intermediate and posterior femora flattened beneath; tarsal claws small, free.

Length $3\frac{3}{4}$, breadth $2\frac{1}{10}$ millim. (♀ ?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. This insect has the facies of a Histerid and the general coloration of the European *Baris analis*. The six dorsal striæ of the elytra are sharply cut, and the seventh and eighth are obliterated. The tarsal claws are less contiguous than in the other species referred to *Diorymerellus*.

CERPHERES, gen. nov.

Rostrum arcuate, stout, not longer than the head and prothorax; mandibles short, notched on the inner edge, decussate; antennal club ovate; prothorax subconical, feebly constricted in front; scutellum small, free, subquadrate; elytra wider than the prothorax, deeply striate throughout, the humeri oblique and not prominent; pygidium not visible; prosternum unarmed, deeply sulcate, the sulcus extending backward between the anterior coxæ and forward to the apex; femora unarmed, linear or feebly clavate, narrowly or obsoletely sulcate beneath; tarsal claws small, free; body more or less ovate, polished or finely alutaceous, glabrous above.

Type, *C. glabrescens*.

Two very small forms are referred to this genus, one (*C. glabrescens*) with the anterior coxæ narrowly separated and the femora linear, the other (*C. rufescens*) with the anterior coxæ more distant and the femora subclavate*. *Cerpheres* is nearly related to *Diorymerellus*.

1. *Cerpheres glabrescens*, sp. n. (Tab. XIV. fig. 12, ♂.)

Subovate, narrow, shining black; glabrous above, the scattered punctures on the legs and under surface each bearing a minute whitish scale. Head sparsely punctate, transversely depressed between the eyes; rostrum curved, rather stout, a little longer than the prothorax, closely punctate, except along the median line, the antennæ inserted at about the middle, the antennal club short ovate. Prothorax transverse, conical, feebly constricted in front; sparsely, rather coarsely punctate. Scutellum flat, subquadrate. Elytra considerably wider than the prothorax, narrowed from the middle, conjointly rounded at the apex, the humeri obtuse; sharply punctate-striate, the interstices broad, smooth, and flat. Beneath sparsely punctate; first ventral segment deeply excavate down the middle. Prosternum with a deep subtriangular excavation extending backward between the anterior coxæ, which are separated by about half their own width. Legs short and comparatively smooth; femora linear, narrowly and shallowly sulcate beneath; tibiæ almost straight.

Length $2\frac{2}{3}$, breadth $1\frac{1}{8}$ millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One male. A small, glossy-black, almost glabrous form, with a narrow, conical prothorax and feebly sulcate femora, the prosternal sulcus extending narrowly backward between the anterior coxæ. Narrower and more shining than *C. rufescens*, wholly black, the prothorax rapidly narrowed from the base, the elytral interstices smoother, the anterior coxæ much less widely separated.

2. *Cerpheres rufescens*, sp. n. (Tab. XIV. figg. 13, 13 a, ♂.)

Ovate, rather narrow, moderately shining, piceous or obscure castaneous, the elytra and legs ferruginous; glabrous above, subglabrous beneath. Head sparsely punctate, transversely grooved and obsoletely foveate between the eyes; rostrum arcuate, moderately stout, about as long as the prothorax, a little longer and smoother in the ♀, the antennæ inserted at the middle, joint 1 of the funiculus as long as 2-4 united, the club ovate. Prothorax transverse, gradually narrowing from the base, constricted in front; closely, somewhat coarsely punctate, except along a narrow median space. Scutellum oblong-subquadrate. Elytra narrowing from a little below the base, the humeri oblique and forming an almost continuous outline with the sides of the prothorax; deeply punctate-striate, the interstices flat, 2 and 3 or 2-4 with an irregular double, and the others with a single, row of very fine punctures. Beneath closely and rather coarsely, a broad space down the middle of the abdomen more sparsely and finely, punctate; first

* *Baridius thoracicus*, Kirsch, from Peru, approaches these forms; but it has the prothorax obtusely margined at the sides anteriorly, and will doubtless have to form the type of a new genus.

ventral segment slightly depressed down the middle in the ♂. Prosternum with a deep, broad, shining sulcus, which becomes narrower between the coxæ, the latter separated by fully their own width. Femora feebly clavate, obsoletely grooved beneath. Tibiæ dilated at the outer apical angle.

Length 3-3½, breadth 1½-1⅔ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo in Guerrero 4600 feet (*H. H. Smith*).

One pair. In this insect the surface is very finely alutaceous above and beneath, the elytra are rufescent, and the prosternal sulcus is broad and deep. *C. rufescens* is not unlike the N.-American *Idiostethus tubulatus* (Lec.), from which it differs in the structure of the prosternum, the less prominent humeri, the minute tarsal claws, &c.

CYLINDROCERINUS, gen. nov.

Rostrum arcuate, not longer than the head and prothorax; mandibles short, decussate; antennal club ovate; prothorax completely and abruptly tubulate in front; scutellum small, subquadrate, free; elytra much wider than the prothorax, subtriangular; pygidium covered by the elytra; prosternum with an oblong compressed cariniform prominence in front of each anterior coxa in the ♂, the coxæ exerted and separated by about their own width; femora clavate, unarmed; tibiæ acutely dilated at the outer apical angle; tarsal claws divergent; body oblong-rhomboidal, polished, almost glabrous above.

Type, *C. tubifer*.

This genus is based on a single species from Mexico which cannot be satisfactorily placed elsewhere. The prosternal prominences of the male are here reduced to two short oblong ridges (more conspicuous than in the same sex of *Centrinus puncticollis*, Boh.); the neck-like construction of the prothorax is very abrupt; and the mandibles are short and decussate. The upper surface is glabrous, except for a patch of white scales at the base of the third interstice, such as is to be found in various species of *Cylindrocerus*, and in *Geræus* (*Centrinus*) *distigma*, Kirsch, and *G. pilosus*. The unique male is somewhat injured, and it is possible that the tip of the pygidium may be exposed in this sex.

1. *Cylindrocerinus tubifer*, sp. n. (Tab. XIV. figg. 14, 14 a, ♀.)

Ovate, shining black, the tip of the rostrum ferruginous; an oblong spot at the base of the third elytral interstice, the prosternum, and the metathoracic episterna, somewhat thickly clothed with small narrow white scales, the rest of the under surface and the legs sparsely set with minute, hair-like, white scales. Head sparsely, minutely punctate, transversely depressed between the eyes; rostrum arcuate, about as long as the head and prothorax, rather slender, thickened towards the base in the ♀, finely punctate, with the apical portion smoother, the antennæ in the ♂ inserted at a little beyond, and in the ♀ slightly behind, the middle, the antennal club ovate, the outer joints of the funiculus strongly transverse. Prothorax broader than long, rounded at the sides anteriorly, the anterior lobe narrow; sparsely, very finely punctate, except along the median line, and with a line of closely-placed coarser impressions along the basal margin and across the subapical constriction. Elytra deeply striate, the striæ feebly punctate, the interstices almost flat, convex at the apex, with excessively minute scattered punctures, the third closely punctate at the base. Beneath closely, the median portion of the abdomen more sparsely, punctate.

♂. Prosternum tumid and with a compressed oblong prominence in front of each coxa, the intervening space shallowly excavate; first ventral segment broadly excavate down the middle.

Length 4-4½, breadth 1⅞-2⅞ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca (*Höge*: ♂), Xucumanatlan (*H. H. Smith*: ♀).

Two specimens.

MICRORHIANUS, gen. nov.

Rostrum arcuate; mandibles short, curved, more or less decussate at the tip when closed; head large, globose; eyes narrowly separated above; prothorax conical, tubulate in front; scutellum very small, free; elytra much wider than the prothorax, subtriangular; pygidium not visible; prosternum unarmed, sulcate, the sulcus extending backward between the coxæ, and limited on each side anteriorly by a slender ridge; anterior coxæ exerted, narrowly separated in *M. hamatus*, more distant in *M. palliditarsis*; femora unarmed; tarsal claws small, connate at the base; body rhomboidal, narrow, polished, glabrous above.

Type, *M. hamatus*.

Microrhianus is based upon two minute forms from Panama, one with a shallow, and the other with a deeper prosternal sulcus. They are narrow and somewhat cuneiform in shape, and have the upper surface glabrous, the legs slender, the elytra deeply striate, &c.

1. *Microrhianus hamatus*, sp. n. (Tab. XIV. figg. 15, 15 a, b, ♂.)

Rhomboid-elliptic, narrow, shining black, the antennæ, tip of the rostrum, and tibial claws ferruginous; glabrous above, the short ante-coxal portion of the prosternum densely squamose, the rest of the under surface and the legs with small scattered white scales. Head closely, finely punctate, the eyes narrowly separated; rostrum strongly arcuate, stout, a little longer than the prothorax, rather coarsely punctate at the sides, smoother along the middle, the antennæ inserted at the apical third, the antennal club stout and ovate. Prothorax slightly broader than long, subconical, strongly constricted in front; with a row of rather coarse punctures along the basal margin and another along the subapical sulcus, the rest of the posterior portion smooth. Scutellum oblong, sulcate. Elytra arcuately narrowing from a little below the base, flattened on the disc, the humeri somewhat swollen; deeply striate, the striæ feebly punctate, the interstices smooth and flat. Beneath closely, the lateral portions sparsely, punctate, the ventral segments 2-4 almost smooth. Prosternum shallowly sulcate. Anterior coxæ narrowly separated. Legs slender, rather long; anterior tibiæ armed with a long stout claw, which is fully as long as the first tarsal joint and notched at the tip, the other tibiæ also sharply unguiculate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen. The anterior tibial claw is remarkably developed in this insect, and the short anterior portion of the prosternum is so densely squamose that the prosternal sulcus is almost hidden. The mandibles are curved, slender and decussate at the tip.

2. *Microrhianus palliditarsis*, sp. n.

Subrhomboidal, narrow, shining black, the antennæ, tip of the rostrum, and tarsi ferruginous; glabrous above, the under surface and legs sparsely clothed with minute white scales. Head closely finely punctate, faintly foveate between the narrowly separated eyes; rostrum strongly arcuate, rather stout, a little longer than the prothorax, sparsely punctate, the antennæ inserted at the middle, the antennal club stout and ovate. Prothorax transverse, conical, strongly constricted in front, almost smooth. Scutellum transverse, sulcate. Elytra oblong-subtriangular, depressed along the suture at the base, the humeri somewhat swollen; deeply striate, the striæ feebly punctate, the interstices smooth and almost flat. Beneath sparsely punctate, the ventral segments 2-4 with a few scattered punctures only, 1 excavate down the middle in the ♂. Prosternum with a deep sulcus, limited on each side by a longitudinal ridge. Anterior coxæ separated by a little less than their own width. Legs rather long and slender; all the tibiæ with a slender claw in both sexes.

Length $2-2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui 2500 feet (*Champion*).

One pair. Very like *M. hamatus*, but with the prothorax almost impunctate, the elytra more parallel-sided and depressed along the suture anteriorly, the prosternum deeply sulcate and almost bare, the anterior coxæ more widely separated, the tarsi ferruginous, and the anterior tibial claw small in both sexes.

EUGERÆUS, gen. nov.

Mandibles rather long, curved, strongly decussate; rostrum cylindrical, arcuate, about as long as the elytra; prothorax subconical, deeply sinuate at the base; scutellum free, subquadrate; elytra subtriangular; pygidium not visible; femora clavate, the anterior and intermediate pairs each with a long, and the posterior pair with a shorter, tooth; anterior coxæ widely separated; prosternum armed with two spines, and also excavate down the middle anteriorly in the ♂; tarsal claws free; body elongate-rhomboidal, clothed with a fine vestiture above and beneath.

Type, *E. unifasciatus*.

Eugeræus includes two closely allied forms from Mexico and Panama respectively. Both have the general facies of a small *Cholus*. The mandibles are somewhat sickle-shaped. Males only are known.

1. *Eugeræus unifasciatus*, sp. n. (Tab. XIV. figg. 16, 16 a, ♂.)

Nigro-piceous, the legs in part ferruginous in one specimen; above and beneath very sparsely clothed with fine, hair-like, ochraceous scales, the elytra with a dense, narrow, transverse fascia of coarser ochreous scales beyond the middle. Head closely punctate; rostrum rather stout, coarsely striate-punctate, the antennæ inserted at the middle. Prothorax broader than long, subconical, the sides somewhat rounded posteriorly; densely, confluent punctate, the narrow interspaces raised into curved oblique ridges. Elytra much wider at the base than the prothorax; finely punctate-striate, the interstices flat and transversely rugose. Beneath closely, coarsely punctate, the transverse prothoracic sulcus strongly foveolate behind the eyes. Prosternum armed with two short spines, and also broadly excavate anteriorly. First ventral segment slightly hollowed down the middle. Anterior tarsi somewhat dilated, joint 2 strongly transverse.

Length 6-7½, breadth 2½-3 millim. (♂.)

Hab. MEXICO, Jalapa (*Höge*), Chiapas (*Sallé*).

Two specimens, varying a little in the width of the narrow elytral fascia. The elytra themselves are relatively broader at the base than in *E. discifer*, and the markings are very different.

2. *Eugeræus discifer*, sp. n. (Tab. XIV. figg. 17, 17 a, ♂.)

Piceous, variegated beneath with black, the antennæ and legs (the knees excepted) more or less ferruginous; above somewhat thickly, the under surface and legs sparsely, clothed with fine, narrow, ochreous scales, those on the prothorax longitudinally arranged, the elytra with a common, heart-shaped patch before the middle and the apex black. Head closely punctate; rostrum rather stout, thickened towards the base, striate-punctate, the antennæ inserted at about the middle, the antennal club acuminate-ovate. Prothorax broader than long, subconical, constricted in front, the sides somewhat rounded posteriorly; densely confluent punctate, the narrow interspaces raised into curved oblique ridges. Elytra finely punctate-striate, the interstices flat and transversely rugose. Beneath closely punctate, the transverse prothoracic sulcus strongly foveolate behind the eyes. Prosternum armed with two porrect spines, and also deeply excavate anteriorly. First ventral segment slightly hollowed down the middle.

Length 5½-6, breadth 2½ millim. (♂.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Two males, varying in the length of the prosternal spines. The two black patches on the elytra are sharply defined—one, heart-shaped, crossing the suture before the middle, and the other at the apex.

PRIONOBARIS, gen. nov.

Rostrum areuate, abruptly separated from the head above; head small; mandibles short, notched within, decussate; prothorax convex, tubulate in front; scutellum free; elytra much wider than the prothorax, triangular; pygidium not visible; prosternum with a deep semicircular impression in the middle; anterior coxæ separated by about half their own width; femora feebly clavate; tibiæ serrate on their inner edge, strongly unguiculate at the apex, the intermediate and posterior pairs dilated at the outer apical angle; tarsal claws connate at the base; body rhomboid-ovate, roughly sculptured, clothed with a sparse setiform vestiture.

Type, *P. asper*.

This genus, based upon a single species from Mexico (the unique type of which is apparently a male), may be readily identified by the serrate tibiæ (a character to be found in several *Diorymeri*), combined with the basally connate tarsal claws and the short decussate mandibles.

1. *Prionobaris asper*, sp. n. (Tab. XIV. figg. 18, 18 *a*, *b*.)

Opaque, nigro-piceous, the antennæ and tarsi obscure ferruginous; very sparsely clothed with decumbent, setiform, intermixed whitish and brown scales, the punctures on the under surface and legs each with a fine whitish hair-like scale. Head minutely punctate, deeply, transversely grooved between the eyes; rostrum a little longer than the head and prothorax, areuate, rather stout, rugosely punctate, smoother and shining at the tip, the antennæ inserted behind the middle, the club ovate. Prothorax broader than long, strongly rounded at the sides, the tubulate anterior portion narrow; coarsely, rugosely punctate, and finely carinate. Elytra compressed at the sides below the humeri and depressed on the disc before and beyond the middle; deeply punctate-striate, the interstices not wider than the striæ, coarsely uniseriate-punctate, the dorsal ones subcostate on each side and the others granulate. Beneath coarsely, closely punctate; first ventral segment excavate down the middle posteriorly. Legs rugosely punctate.

Length $4\frac{1}{10}$, breadth $2\frac{1}{3}$ millim. (♂?)

Hab. MEXICO, Juquila in Oaxaca (*Sallé*).

One specimen, rather worn.

GERÆUS.

Geræus, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 322, 323 (1889).

Centrinus, subgenera i-ix, Casey, Ann. N. York Acad. Sci. vi. pp. 467, 572 (1892).

Following Casey's system of classification, based mainly upon the form of the mandibles, the name *Centrinus* cannot be used for the numerous North-American species he placed in that genus. The type of *Centrinus*, Schönherr, as stated by Pascoe, is *Baris bicuspis*, Germ., an insect that is certainly congeneric with the type of *Linonotus*, Casey (*Centrinus distinctus*, Boh.*), both having the mandibles strongly

* Recorded by Casey from "Texas," but doubtless there has been some mistake about this locality, no Centrinid of the kind being known from within our limits.

denticulate on their inner edge. *Centrinus*, therefore, will have to be restricted to the few South-American forms (all of large size *) possessing this structure, and the name *Geræus*, Pasc. (type *Centrinus senilis*, Boh.), applied to the very large number of species having the mandibles straight on their inner edge and more or less pointed at the tip †. *Odontocorynus* is here retained as distinct, as well as *Nicentrus*, *Centrinites*, and *Centrinopus*, though these latter are scarcely separable from *Geræus*. About 100 species from within our limits are referred to *Geræus*, the head-quarters of the genus being apparently in Mexico. The male-characters are here of the utmost importance in discriminating many closely allied forms, and some of them have scarcely been noticed hitherto, such as the greater development of the anterior tibial claw in certain cases, the ciliation of the anterior or posterior tibiæ, or of the under surface of the femora, the dilated anterior tarsi, the toothed or notched anterior tibiæ, the dilated posterior tibiæ, &c. The prosternal spines vary in development (as in *Diastethus*), and they may be sometimes reduced in the same species to conical tubercles. In a few forms the antennal club is elongated in the male, and in one (*G. serratispinis*) the rostrum is sagittiform in this sex.

The various species may be grouped thus ‡:—

- a. Rostrum long, slender, strongly arcuate, and of equal thickness throughout ; femora sulcate beneath. [*♂* unknown.] Species 1.
- b. Rostrum (except in *G. puncticollis*) usually more or less thickened towards the base ; femora (except at the apex) not sulcate beneath.
 - a¹. Upper surface finely pilose and with patches of white scales at the base of the elytra. [*♂* unknown.] Species 2.
 - b¹. Upper surface not finely pilose, with or without scales or decumbent setæ.
 - a². Prosternum (*♂*) bispinose or bituberculate immediately in front of the anterior coxæ.
 - a³. Prosternal spines (*♂*) very long and serrate ; rostrum sagittiform Species 3.
 - b³. Prosternal spines (*♂*) very long, abruptly dilated at the base Species 4.
 - c³. Prosternal spines (*♂*) not or gradually thickened towards the base, sometimes reduced to two tubercles.
 - a⁴. Anterior tibiæ (*♂*) armed with a triangular tooth on the inner edge. Species 5.
 - b⁴. Anterior tibiæ (*♂*) without tooth on the inner edge.
 - a⁵. Posterior tibiæ (*♂*) dilated externally Species 6.
 - b⁵. Posterior tibiæ (*♂*) not dilated externally Species 7-53.

* *C. bicuspis* and *olfersi*, Germ., and *C. distinctus*, *germari*, *curvirostris*, *parallelus*, *westwoodi*, Boh.

† *C. strobili*, Steinh., from "Salvador" must be an Argentine insect.

‡ Amongst those of which the ♀ only is known, *G. biplagiatus*, *teniatus*, *flagellifer*, *octomaculatus*, *tripularis*, *coarctatus*, *duplaris*, *x-notatum*, *bifurcatus*, *omitemæ*, *varius*, *varipes*, and *leucomelas* may prove to be wrongly placed when the ♂ is found.

- b*². Prosternum (♂) with two flattened bifurcate processes in front of the anterior coxæ Species 54.
- c*². Prosternum (♂) with two completely connate spines Species 55, 56.
- d*². Prosternum (♂ ♀) bituberculate anteriorly Species 57.
- e*². Prosternum (♂) slightly tumid in front of each coxa; prothorax abruptly tubulate in front; elytra uneven; rostrum not widened towards the base; upper surface almost bare Species 58.
- f*². Prosternum (♂ ♀) unarmed.
- a*³. Antennal club elongate in ♂, ovate in ♀. Species 59–62.
- e*³. Antennal club acuminate-ovate in ♂, smaller and ovate in ♀; anterior tarsi dilated in ♂ Species 63, 64.
- f*³. Antennal club oblong-ovate or ovate in both sexes; anterior tarsi not dilated in ♂.
- c*⁴. Upper surface more or less metallic; species small Species 65–68.
- d*⁴. Upper surface not metallic.
- c*⁵. Elytra and prothorax with scattered or close vestiture.
- a*⁶. Mandibles moderately long or short.
- a*⁷. Subapical callosities of the elytra prominent Species 69.
- b*⁷. Subapical callosities of the elytra not prominent Species 70–100.
- b*⁸. Mandibles more elongate; eyes narrowly separated Species 101.
- d*⁸. Elytra glabrous; the prothorax squamose Species 102.

1. *Geræus arcuatirostris*, sp. n. (Tab. XIV. figg. 19, 19 *a*, ♀.)

Broad ovate, rather convex, feebly shining, piceous, the antennæ and the tips of the tarsi ferruginous; clothed with rather long, coarse, adpressed, setiform, ochreous scales, the vestiture of the prothorax transversely arranged and that of the elytra placed in close lines, the elytra also with a few intermixed whitish setæ; the under surface and legs with hair-like, yellowish-white scales. Head closely punctate; rostrum slender, cylindrical, reaching to the apex of the metasternum, abruptly and strongly arcuate from the base, somewhat coarsely striate-punctate, smooth along the middle, the antennæ inserted at the basal fourth, the antennal club large, acuminate-ovate. Prothorax transverse, rounded at the sides, constricted and much narrowed in front; densely, rugosely, confluent punctate, and also carinate. Scutellum small, transverse. Elytra broader than the prothorax subcordate; deeply punctate-striate, the interstices asperate-punctate and (1 and 2 excepted) narrowly costate. Beneath densely punctate. Prosternum narrowly sulcate. Anterior coxæ separated by much less than their own width. Femora sulcate beneath.

Length $3\frac{1}{2}$ –4, breadth $2\frac{1}{4}$ – $2\frac{1}{2}$ millim. (♀.)

Hab. MEXICO (*Mus. Brit.*), Cordova (*Sallé*).

Two females. In this insect the rostrum is strongly and abruptly curved from the base, the prothorax is longitudinally rugose and carinate, and the elytral interstices are densely asperate-punctate and feebly costate. The prosternum is probably spined in the male.

2. *Geræus pilosus*, sp. n. (Tab. XIV. figg. 20, 20 *a*, ♀.)

Oblong-subrhomboidal, shining, black, the rostrum (except at the base) and antennæ obscure ferruginous; the prothorax and elytra somewhat thickly clothed with very fine, short, dark, erect hairs, the elytra with a

dense oblong patch of coarse white scales at the base of the third interstice; the under surface (a broad space down the middle of the abdomen excepted) also clothed with white scales, these becoming coarser and closer along the sides, and there condensed into an interrupted stripe which is continued across the prosternum. Head closely punctate, transversely depressed between the eyes; rostrum long, strongly arcuate, slender and almost smooth, the short basal portion abruptly thickened and rugosely punctate, the antennæ inserted close to the base, joint 2 of the funiculus nearly as long as 1, the others shorter, gradually decreasing in length, the club oblong-ovate, acuminate, and with distinct transverso sutures. Prothorax transverse, rather convex, rounded at the sides, narrowed and strongly constricted in front, closely punctate. Scutellum small, transversely subquadrate. Elytra triangular, narrowly and sharply striate, the striæ faintly punctate, the interstices flat and minutely punctate. Beneath closely, the broad almost bare space down the middle of the abdomen sparsely, punctate. Legs rather long and slender, the femora abruptly clavate.

Length $4\frac{1}{5}$, breadth $2\frac{1}{10}$ millim. (♀.)

Hab. MEXICO, San Andres Tuxtla in Vera Cruz (*Sallé*).

One female. The dense streak of pure white scales at the base of the third elytral interstice gives this insect the general appearance of various species of *Cylindrocercus* and *Madarus*. The antennæ (♀) are inserted close to the base of the rostrum and have a rather long club, the prothorax and elytra are fusco-pilose, and the femora are abruptly clavate. The prosternum will probably prove to be bispinose in the male.

3. *Geræus serratispinis*, sp. n. (Tab. XIV. figg. 21, 21 a, b, ♂.)

♂. Subrhomboidal, somewhat flattened above, shining, black; the prothorax above and beneath sparsely clothed with long, ochreous, hair-like, transversely-arranged scales, the elytra with irregular rows of intermixed ochreous and black, adpressed, setiform scales, the rest of the surface with narrow, hair-like, ochreous or yellowish scales. Head sparsely punctate, transversely depressed between the eyes, the latter very large; rostrum arcuate, slender, reaching to beyond the apex of the metasternum, abruptly dilated and sulcate on each side from about the basal third and gradually narrowing thence towards the tip, striate-punctate, smooth down the centre, the antennæ slender and inserted far behind the middle, the antennal club oblong-ovate. Prothorax broad, transverse, rounded at the sides anteriorly, much narrowed and constricted in front, deeply sinuate at the base; somewhat closely punctate, the punctures on the disc transverse. Scutellum transverse. Elytra subtriangular, about the same width at the base as the elytra; narrowly punctate-striate, the interstices flat and asperato-punctate. Beneath closely punctate. Prosternum armed with two very long, porrect, dorsally serrated spines, the space between them smooth and deeply sulcate to the transverse subapical fovea, on either side of which is another deep fovea. Anterior coxæ separated by about their own width. Legs long; anterior tibiæ pilose within; tarsi rather broad, the bilobed third joint large, the anterior pair clothed with long fine projecting hairs.

♀. Rostrum very slender, flattened from near the base and almost smooth.

Length $5\frac{1}{5}$ — $\frac{1}{2}$, breadth $2\frac{1}{2}$ — $\frac{5}{8}$ millim.

Hab. COSTA RICA (*U.S. Nat. Mus.*: ♀); PANAMA, Volcan de Chiriqui (*Champion*: ♂).

Two specimens. A remarkable form and the only Central-American species with serrated prosternal spines and a sagittiform rostrum in the male.

4. *Geræus sinuatispinis*, sp. n. (Tab. XIV. figg. 22, 22 a, ♂.)

Oblong, subrhomboidal, nigro-piceous, the antennæ and prosternal spines obscure ferruginous; thickly clothed with rather long, coarse, narrow, ochreous scales, which are transversely arranged on the prothorax, the elytra with an almost bare transverso black patch at the sides about midway between the base and apex. Head finely punctate, transversely grooved between the eyes; rostrum very long, strongly arcuate, irregularly striate-punctate, the basal portion carinate at the sides and slightly thickened, the antennæ

inserted at about the basal third. Prothorax broad, transverse, much narrowed and constricted in front, the sides rounded anteriorly and parallel behind; closely, finely punctate. Elytra subtriangular, finely punctate-striate, the interstices flat and asperate-punctate. Beneath densely punctate. Prosternum armed with two moderately long, strongly sinuate spines—which are curved upward at the tip and dilated and concave at the base within,—and with a deep transverse subapical fovea, and a smaller fovea on each side of it, the space behind the central one smooth and tumid. Anterior tibiae set with long hairs along their inner edge, the anterior tarsi also with long projecting hairs. Length $5\frac{1}{8}$, breadth $2\frac{2}{3}$ millim. (σ .)

Hab. GUATEMALA, Tamahu in Vera Paz (*Champion*).

One male. Larger and more elongate than *G. rectispinis*, the prothorax with the sides parallel behind and more rounded anteriorly, the elytra with a single transverse dark patch at the sides and indications of a faint spot near the apex, the prosternal spines of the male narrowly separated at the base and peculiarly-shaped, the anterior tibiae and tarsi hairy in this sex. *G. sinuatispinis* has somewhat the facies of *G. pexus*.

5. *Geræus bipustulatus*, sp. n. (Tab. XIV. figg. 23, 23 a, b, σ .)

Ovate, black, the antennæ and the tips of the tarsi obscure ferruginous; densely clothed above and beneath with whitish or brownish-white scales, those on the prothorax radiating from the median line, the elytra each with a sharply-defined, transverse, sinuous, black patch at the middle of the disc extending inward to the third stria; the prothorax, elytra, and under surface densely, finely punctate. Head finely punctate, foveate between the eyes; rostrum rather stout, strongly arcuate, a little shorter than the elytra, closely striate-punctate in the σ , the apical half much smoother in the φ , the antennæ inserted at about the middle. Prothorax transverse, rounded at the sides anteriorly, much narrowed in front. Elytra finely striate. Legs short.

σ . Prosternum shallowly sulcate, and armed with two short conical spines; anterior tibiae with a short triangular tooth on the inner edge at about the middle.

Length $3\frac{3}{4}$ – $4\frac{1}{10}$, breadth 2– $2\frac{1}{2}$ millim. (σ φ .)

Hab. MEXICO (*coll. Solari*), Jalapa (*Höge*), Teapa (*H. H. Smith*); NICARAGUA, Chontales (*Janson*).

We have received seven specimens of this well-marked species. The vestiture, which is usually white or paler beneath, is so dense as to hide the sculpture, and the elytra have each a transverse, sinuous, sharply-defined black patch on the outer part of the disc at about the middle. The male has short prosternal spines and toothed anterior tibiae.

6. *Geræus podagrosus*, sp. n. (Tab. XIV. figg. 24, 24 a, b, σ .)

Subrhomboidal, black, the antennæ sometimes in part ferruginous, the elytra shining; thickly clothed above and beneath with rather coarse, narrow, flavo-cinereous or cinereous scales, which on the prothorax are transversely arranged, the elytra each with two black spots on the outer part of the disc—one, transverse, just before the middle, the other, oblique, near the apex. Head closely punctate, transversely grooved between the eyes; rostrum arcuate, long and very slender, slightly thickened at the base, finely striate-punctate, smoother and longer in the φ , the antennæ inserted near the middle in the σ , and at about the basal third in the φ . Prothorax transverse, rounded at the sides anteriorly, much narrowed in front; densely punctate, the punctures rounded and separate one from another. Elytra subtriangular, narrowly punctate-striate, the interstices flat and asperate-punctate. Beneath closely punctate. Prosternum with a smooth transverse subapical excavation.

♂. Prosternum armed with two short, widely-separated, slender, porrect spines; first ventral segment flattened down the middle; posterior tibiæ angularly dilated externally at about one-third from the apex and more or less widened thence to the tip.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth 2 – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpam, Cordova (*Sallé*); GUATEMALA, Zapote, Cerro Zunil (*Champion*); NICARAGUA, Chontales (*Belt, Janson*); COSTA RICA, Escazu (*Pittier*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Numerous examples. Easily distinguished by the angularly dilated hind tibiæ of the male. Less elongate than *G. senilis*, the second spot on the elytra placed closer to the margin and nearer the apex, the prosternal spines short, slender, and porrect. The mandibles are slightly hollowed at the sides beneath. *Centrinus podagricus*, Boh., from Brazil, seems to have somewhat similar posterior tibiæ.

7. *Geræus senilis*. (Tab. XIV. figg. 25, 25 a, ♂.)

Centrinus senilis, Gyll. in Schönlh. Gen. Curc. iii. p. 759¹; Boh. in Schönlh. Gen. Curc. viii. 1, p. 215²; Casey, Ann. N. York Acad. Sci. vi. pp. 576, 589 (♀)³.

Geræus senilis, Pasc. Ann. & Mag. Nat. Hist. (6) iv. p. 323⁴.

Centrinus quadrisignatus, Dugès, in litt.⁵

Var. The black spots longitudinally confluent on each elytron.

Hab. NORTH AMERICA, Santa Rita Mts. in Arizona³.—MEXICO^{1 2 4} (*Truqui*, in *Mus. Brit.*; *Dugès*, in *U.S. Nat. Mus.*), Guanajuato, Toxpam, Capulalpam, Etlá, Parada (*Sallé*), Chilpancingo (*Höge, H. H. Smith*), Matamoros Izucar, Irapuato, Jalapa (*Höge*), Amula, Xucumanatlan (*H. H. Smith*), Temax in N. Yucatan (*Gaumer*); GUATEMALA, Aceytuno (*Salvin*), Panzos, San Juan and San Gerónimo in Vera Paz (*Champion*); COSTA RICA (*coll. Fry*), Escazu (*Biolley*), Piedras Negras (*U.S. Nat. Mus.*).

A common insect in Mexico and sent us in great abundance by Mr. Gaumer. It is found on a species of *Croton*, according to Prof. Biolley. *G. senilis* is a little more elongate than any of its allies and the two black spots on the disc of each elytron (which are sometimes small or evanescent, and sometimes longitudinally coalescent) are placed one, transverse, before the middle, and the other, triangular, towards the apex. The fully-developed male has the prosternum sulcate behind the deep, transverse, polished, subapical excavation, and the spines about as long as the tarsi and curved upwards; the ventral depression in this sex is broad and shallow. In two of the Guatemalan examples the vestiture of the elytra is almost wholly black, except at the base and along the suture. The mandibles, as noted by Casey, are hollowed at the sides beneath, appearing toothed at the base, when viewed in profile.

The length varies from $3\frac{1}{2}$ –6 millim.

8. *Geræus rectispinis*, sp. n. (Tab. XIV. figg. 26, 26 a, ♂.)

Subrhomboidal, black or piceous, the antennæ and prosternal spines, and sometimes the rostrum and the legs in part, ferruginous; thickly clothed above and beneath with rather coarse, narrow, ochreous or flavo-

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cinereous scales, which on the prothorax are transversely arranged, the elytra each with two transverse black spots on the outer part of the disc—one, large, a little before the middle; the other, small, near the apex. Head with a few minute punctures, transversely grooved between the eyes; rostrum arcuate, long and slender, slightly thickened at the base, finely striate-punctate, longer and almost smooth in the ♀, the antennæ inserted at a little behind the middle in the ♂ and nearer the base in the ♀. Prothorax transverse, rounded at the sides anteriorly, much narrowed in front; closely punctate. Elytra subtriangular, narrowly punctate-striate, the interstices flat and asperato-punctate. Beneath closely punctate. Prosternum with a transverse, smooth, subapical fovea, and a fovea on each side of it.

♂. Prosternum tumid on each side of the very deep transverse subapical excavation, and armed with two short, porrect spines, which in fully-developed examples are about as long as the tarsi; first ventral segment broadly excavate and subglabrous down the middle.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth 2 – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*), Jalapa (*Höge*); GUATEMALA, Sabo and Chacoj in Vera Paz (*Champion*), Trece Aguas (*U.S. Nat. Mus.*).

Fourteen specimens, eight of which are from Sabo. Less elongate than *G. senilis*, the second elytral spot placed nearer the outer margin, the short prosternal spines straight, the ventral excavation of the male deeper and almost bare, the deep prosternal excavation in this sex limited on each side by a curved prominence, the mandibles without visible tooth at the sides beneath.

9. *Geræus trinotatus*, sp. n. (Tab. XIV. figg. 27, 27 a, ♂, var.)

Subrhomboidal, black or piceous, the antennæ, rostrum, prosternal spines, and legs in part, usually more or less ferruginous, the elytra shining; thickly clothed with rather coarse, narrow, flavo-cinereous scales, which on the prothorax are transversely arranged, the elytra with a common, subquadrate patch on the suture near the apex and an interrupted transverse patch on the disc before the middle infuscate or black. Head closely punctate, transversely grooved between the eyes; rostrum long, arcuate, rather slender, thickened at the base, striate-punctate, longer, flatter, and smoother in the ♀, the antennæ inserted at the basal third in the ♀ and at a little nearer the middle in the ♂. Prothorax transverse, rounded at the sides anteriorly, much narrowed in front, closely punctate. Elytra subtriangular, narrowly punctate-striate, the interstices flat and asperato-punctate. Beneath densely punctate. Prosternum with a smooth deep subapical fovea.

Var. The transverse dark patch on the disc of each elytron reduced to two small spots, the inner spot in one specimen (fig. 27) coalescent with the common subapical patch.

♂. Prosternum with a large, deep, smooth, oval cavity extending forward to the transverse fovea in front, and armed with two very long spines, which are curved downward at the tip; first ventral segment slightly depressed down the middle.

Length $4\frac{1}{2}$ –5, breadth $2\frac{2}{5}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba (*Champion*).

Three specimens from each locality, those from Chontales (taken as the types) somewhat abraded and those from Bugaba with the transverse dark patch on the disc of each elytron reduced to small spots. The four males agree in the form of the prosternal spines and all have a dark subquadrate sutural patch. The mandibles are hollowed at the sides beneath.

10. *Geræus tenuispinis*, sp. n. (Tab. XIV. figg. 28, 28 a, ♂.)

Very like *G. trinotatus*, but with the anterior elytral patch more or less triangular and placed about midway between the base and apex, the common subapical patch reduced to a small or oblique spot on each side

of the suture; the prosternum with a transverse subapical fovea and another fovea on each side of it, the spines and excavation of the male varying in development, the spines in fully-developed examples curved upward at the tip and as long as the elytra, in the undeveloped form reduced to two tubercles.

Length $3\frac{1}{4}$ –4, breadth $1\frac{2}{3}$ –2 millim. (σ ♀.)

Hab. MEXICO, Toxpam (*Sallé*), Teapa (*H. H. Smith*); GUATEMALA, Chacoj, Cahabon, and Chiacam in Vera Paz (*Champion*), Coban (*Conradt*); PANAMA, Bugaba (*Champion*).

Twelve specimens, varying in the extent of the elytral markings, but apparently distinct from *G. trinotatus*. Five males have been received—two with very long prosternal spines, one of these being shown on our Plate.

11. *Geræus cemas*. (Tab. XIV. figg. 29, 29 a, ♀, var.)

Centrinus cemas, Boh. in Schönh. Gen. Curc. iii. p. 738 (σ)¹; viii. 1, p. 212 (σ ♀)².

Subrhomboidal, rather narrow, piceous, the rostrum, antennæ, legs, and base of the elytra more or less ferruginous, the rest of the elytra black; thickly clothed with rather coarse pale ochraceous scales, the elytra (an oblique streak on the outer part of the disc near the tip, and a few scattered scales along the third and fifth interstices, and some others at the sides and apex, excepted) black from about the basal fourth, the prothorax faintly trilineate with whitish and with the scales transversely arranged; the vestiture of the under surface dense, yellowish-white. Head closely punctate, foveate between the eyes; rostrum arcuate, rather slender, not longer than the elytra, sparsely, finely punctate, thickened and rougher at the base, the antennæ inserted at about the basal third, the antennal club acuminate-ovate. Prothorax transversely rounded at the sides anteriorly, much narrowed in front; densely, finely punctate. Elytra subtriangular; narrowly punctate-striate, the interstices asperato-punctate. Beneath densely punctate. Prosternum with a transverse subapical impression and the subapical groove deeply impressed behind each of the eyes.

Length $2\frac{9}{10}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).—BRAZIL¹.

This insect appears to be a small form of *Centrinus cemas*, Boh., and there are two specimens in the series of that species in the British Museum very similar to the one here described; the true *C. cemas*, however, has the elytra black to near the base. Females only have been seen by me. The more extended black vestiture of the elytra separates *G. cemas* from *G. tenuispinis*, both species having the prosternum bispinose in the male.

12. *Geræus trilineatus*, sp. n. (Tab. XIV. figg. 30, 30 a, ♂.)

Rhomboid-ovate, piceous, the prosternal spines, antennæ, rostrum, and legs more or less ferruginous; thickly clothed with rather coarse pale ochraceous scales, the prothorax faintly trilineate with whitish, these lines being continued along the suture and fifth elytral interstice, the elytra each with a transverse, rounded, interrupted, blackish patch on the disc before the middle and a short oblique blackish streak near the suture before the apex; the vestiture of the under surface white and dense. Head closely punctate, foveate between the eyes; rostrum strongly arcuate, very long, thickened towards the base, striate-punctate, the antennæ inserted far behind the middle. Prothorax transverse, rounded at the sides anteriorly, much narrowed in front; densely, finely punctate. Elytra subtriangular, narrowly punctate-striate, the interstices asperato-punctate. Prosternum armed with two very long porrect spines, and also with a broad smooth excavation between them extending forward to the transverse subapical fovea.

Length $3\frac{1}{5}$ –4, breadth $1\frac{3}{4}$ –2 millim. (σ .)

2 MM 2

Hab. PANAMA, Bugaba (*Champion*), Tabernilla and Lion Hill (*Busck*, in *U.S. Nat. Mus.*).

Three males. Shorter and more ovate than *G. tenuispinis*, the prothorax and elytra faintly trilineate with whitish, the interrupted dark patch on the elytra placed further forward and at the middle of the disc. The third and fifth elytral interstices have three, and the others two, rows of scales.

13. *Geræus balaninoides*, sp. n. (Tab. XIV. figg. 31, 31 a, ♂.)

Oblong-subrhomboidal, rather dull, nigro-piceous, the antennæ (the club excepted), prosternal spines, apical half of the rostrum, and the legs in part, ferruginous; rather sparsely clothed with narrow pale ochreous scales, which are transversely arranged on the prothorax, the elytra with a few scattered intermixed darker scales, the vestiture of the under surface a little closer and paler. Head sparsely punctate, transversely grooved between the eyes; rostrum long, arcuate, rather slender, striate-punctate, the antennæ inserted behind the middle, the antennal club oblong-ovate. Prothorax transverse, densely, finely punctate. Elytra subtriangular, narrowly punctate-striate, the interstices flat and asperato-punctate. Beneath densely punctate. Prosternum with a deep transverse subapical fovea, and armed with two very long porrect spines, which are slightly curved upward at the tip, the space between them broadly flattened and smooth. First ventral segment unimpressed. Anterior tarsi with a few bristly hairs, the bilobed third joint broad.

Length 4, breadth 2 millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One male. Smaller, duller, and narrower than *G. serratispinis*, the vestiture closer, the elytra with fewer intermixed darker scales, the prosternal spines (which are as long as the rostrum) not serrate, &c. *G. balaninoides* is a little more elongate than *G. tenuispinis*, the vestiture is sparser and finer, and the scattered dark scales on the elytra give a mottled appearance to the surface. It is very like a *Balaninus*.

14. *Geræus biplagiatus*, sp. n.

Elliptic, piceous, the antennæ, rostrum, and legs more or less ferruginous; thickly clothed with narrow, ochreous scales; the elytra each with a sharply-defined transverse blackish patch on the outer part of the disc at about the middle, the scales on the interstices arranged in two or three lines (the first with one line only from near the base); the vestiture of the under surface dense and whitish. Head densely punctate; rostrum rather more than half the length of the body, strongly arcuate, slender and almost smooth, abruptly thickened, squamose and laterally punctate at the base, the antennæ inserted at the basal fourth, the club acuminate-ovate. Prothorax strongly transverse, rounded at the sides anteriorly, constricted in front; densely, finely punctate. Scutellum squamose. Elytra subtriangular, the humeri rounded; finely punctate-striate, the interstices rugulosely punctate. Beneath densely, finely punctate. Prosternum with a smooth, deep, transverse fovea towards the apex and also transversely excavate behind each of the eyes. Anterior coxæ separated by fully their own width. Legs moderately long; anterior tibiæ unguiculate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim. (♀.)

Hab. NICARAGUA, Chontales (*Janson*).

One specimen. This insect resembles *G. rectispinis*, but it is very much smaller, the rostrum (♀) is abruptly thickened at the base, the antennæ are inserted at the basal fourth, &c. The prosternum is doubtless bispinose in the male.

15. *Geræus undatus*, sp. n.

Subrhomboidal, rather convex, nigro-piceous or piceous, the rostrum, antennæ, prosternal spines, tibiæ, and tarsi ferruginous; somewhat thickly clothed with small, narrow, ochraceous or yellowish-white scales, those on the prothorax long, hair-like, and transversely arranged, and those on the elytra almost wholly condensed into a transverse sub-basal fascia (extending forward on to the scutellum), a common angulated fascia beyond the middle, and a subquadrate apical patch, the rest of the elytral surface with scattered, minute, fuscous scales; the vestiture of the under surface close, yellowish-white. Head closely punctate, shallowly foveate between the eyes; rostrum strongly arcuate, considerably longer than the head and prothorax, rather slender, almost smooth, except at the sides towards the base, the antennæ inserted at about the middle, the antennal club ovate. Prothorax short, rounded at the sides from near the base, constricted and narrow in front; densely, finely punctate. Elytra triangular, much wider than the prothorax; narrowly punctate-striate, the interstices flat and roughly punctulate. Beneath densely punctate. Prosternum armed with two long or moderately long slender spines, and also very deeply excavate down the middle anteriorly. Anterior coxæ separated by fully their own width. Legs rather long and slender.

Length $2\frac{1}{2}$ – $2\frac{4}{5}$, breadth $1\frac{1}{5}$ – $1\frac{1}{2}$ millim. (♂.)

Hab. GUATEMALA, Senahu in Vera Paz, Cerro Zunil (*Champion*).

Two males—one, in fresh condition, taken as the type, from Senahu, the other worn, with much longer prosternal spines, from Cerro Zunil. A small, short form near *G. tenuispinis*, with two transverse pallid fasciæ on the elytra—one basal, the other angulate, beyond the middle. The humeri are more prominent than in many of the allied species.

16. *Geræus scabrosus*, sp. n. (Tab. XIV. figg. 32, 32 a, ♂.)

Subrhomboidal, black, the tarsi and prosternal spines obscure ferruginous; sparsely clothed with short, decumbent, intermixed pallid and blackish, setiform scales; the prothorax with a patch at each hind angle, the elytra with one or two spots at the base on each side of the scutellum, and the mesothoracic epimera densely clothed with narrow ochreous scales; the vestiture of the under surface and legs very sparse, fine, and whitish. Head closely punctate, transversely grooved between the eyes; rostrum (♂) strongly arcuate, long, much thickened towards the base, flattened at the tip, coarsely striate-punctate, (♀) longer, slender, and almost smooth, sparsely punctured and thickened at the extreme base and flattened thence to the tip, the antennæ inserted considerably behind the middle in the ♂ and at the basal third in the ♀. Prothorax transverse, rounded at the sides anteriorly, constricted and much narrowed in front; densely, confluent punctate. Elytra subtriangular, narrowly punctate-striate, the interstices flat and rugosely punctate. Beneath closely, rather coarsely punctate. Prosternum with a transverse impression in front limited on each side by a short ridge.

♂. Prosternum armed with two very long, porrect spines, which are curved downward towards the tip, and with a deep circular excavation behind the transverse impression. First ventral segment broadly depressed and sparsely punctate in the middle.

Length $5\frac{1}{4}$ – $5\frac{1}{2}$, breadth $2\frac{3}{4}$ – $2\frac{4}{5}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One pair. A roughly-sculptured form, with short, scattered, somewhat bristly vestiture, and dense patches of ochreous scales at the hind angles of the prothorax, at the base of the elytra, and on the side-pieces of the mesosternum; the rostrum very differently shaped in the two sexes; the prosternum armed with long, downwardly-curved spines in the male. The following is the Guatemalan representative of the same species*.

* I have seen a somewhat similar undescribed Mexican form belonging to the U.S. Nat. Mus., but it has a short stout rostrum.

17. *Geræus inornatus*, sp. n. (Tab. XIV. figg. 33, 33 a, ♀.)

Subrhomboidal, broad, black, the tips of the tarsi obscure ferruginous; sparsely clothed with short, decumbent, setiform, pallid scales, which are fine and longitudinally arranged on the prothorax, and coarser and intermixed with narrow black scales on the elytra, the latter with an ill-defined ochreous patch at the base of the second and third interstices; the vestiture of the under surface and legs sparse and wholly white. Head closely punctate, foveate between the eyes; rostrum moderately curved, flattened, very long and slender, thickened and punctured at the base, for the rest smooth, the antennæ inserted at about the basal fourth, the antennal club ovate. Prothorax transverse, rounded at the sides anteriorly, constricted and much narrowed in front; densely, rugosely punctate, and with an incomplete smooth median line. Elytra rather long, subtriangular, flattened on the disc; punctate-striate, the interstices flattened and rugosely punctate. Beneath closely, coarsely punctate, smoother along the middle. Prosternum with a transverse impression in front limited on each side by a short ridge. Anterior coxæ widely separated.

Length $7\frac{1}{2}$, breadth $3\frac{3}{4}$ millim. (♀.)

Hab. GUATEMALA, Sinanja in Vera Paz (*Champion*).

One female. Larger than *G. scabrosus* (♀), the elytra relatively longer, the prothorax and mesosternum without dense patches of ochreous scales, the prothorax with a smooth median line, the rostrum longer, &c.

18. *Geræus lineellus*. (Tab. XV. figg. 1, 1 a, ♂.)

♀. *Centrinus lineellus*, Lec. Proc. Acad. Phil. 1859, p. 79¹; Proc. Am. Phil. Soc. xv. p. 312²;

Casey, Ann. N. York Acad. Sci. vi. p. 592³; Canad. Ent. 1904, p. 323⁴.

♂. *Centrinus dolus*, Schauf. Rev. Zool. 1866, p. 418⁵.

♂. Prosternum armed with two porrect spines, which are sometimes nearly as long as the rostrum, and more or less sulcate; first ventral segment depressed down the middle; anterior tibiæ slightly hollowed towards the apex within and sharply unguiculate; antennæ inserted beyond the middle of the rostrum.

Hab. ?NORTH AMERICA, Tejon in California^{1 2 3}.—MEXICO, Motzorongo (*Flohr*), Atoyac in Vera Cruz (*H. H. Smith*), Playa Vicente (*Sallé*), Cordova (*U.S. Nat. Mus.*), Teapa (*Sallé, Höge, H. H. Smith*); BRITISH HONDURAS, Belize, Rio Hondo (*Blancaneaux*); GUATEMALA⁴, Senahu, Sabo, San Juan, Chiacam, and San Gerónimo in Vera Paz, Guatemala City, Zapote (*Champion*), Coban (*Conradt*), Trece Aguas (*U.S. Nat. Mus.*); NICARAGUA, Chontales (*Janson*); COSTA RICA, Higuito, Reventazon, San José, Surubres (*Biolley*), Tucurrique, Zent, Puerto Limon (*U.S. Nat. Mus.*); PANAMA, Volcan de Chiriqui (*Champion*).—COLOMBIA⁵.

One of the commonest Centrinides in Central America, and readily recognizable by its sharply vittate prothorax and elytra. The locality "California" is doubtful, as noted by Casey⁴. Some of the specimens sent by Biolley are labelled as having been found on *Polygonum punctatum* and *Calea axillaris*. The prosternal spines are very long and porrect in fully-developed males, as described by Schaufuss. The second joint of the funiculus is much shorter than the first. The length varies from $2\frac{1}{2}$ –4 mm.

19. *Geræus trivittatus*, sp. n. (Tab. XV. figg. 2, 2 a, ♂.)

Subrhomboidal, black; the prothorax and elytra with three rather broad continuous vittæ (the outer ones submarginal on the elytra, the median one confined to the sutural interstice and not extending to the scutellum), which are sometimes connected across the anterior portion of the pronotum, the anterior half of the prothorax beneath, and the metathoracic episterna, densely clothed with narrow ochreous scales, the rest of the vestiture of the upper surface close and black, and that of the under surface and legs white, the rostrum with a few hair-like ochreous scales. Head closely punctate, transversely grooved between the eyes; rostrum strongly arcuate, longer than the head and prothorax, stout in its basal half and becoming more slender thence to the tip, striate-punctate, the apical half much smoother in the ♀, the antennæ inserted at (♀) or beyond (♂) the middle, joints 1 and 2 of the funiculus elongate, 2 nearly as long as 1, the club ovate. Prothorax transverse, subconical, feebly constricted in front; densely, finely, confluent punctate. Elytra subtriangular, narrowly punctate-striate, the interstices broad and densely, rugulose punctate. Beneath densely punctate. Prosternum slightly depressed down the middle in front of the coxæ, the latter narrowly separated. Tibiæ strongly unguiculate.

♂. Prosternum armed with two downwardly-directed spines; first ventral segment flattened down the middle; anterior tibiæ slightly hollowed on the inner side at the apex.

♀. Prosternum with a small conical tubercle in front of each anterior coxa which is sometimes obsolete.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth $1\frac{3}{8}$ – $2\frac{3}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*; *coll. Solari*), Orizaba (*Sallé*); GUATEMALA (*Sallé*), near the city (*Salvin*), Capetillo, Dueñas, San Gerónimo (*Champion*), Chimaltenango (*Conradt*), Senahu (*Haase, in U.S. Nat. Mus.*); PANAMA, Volcan de Chiriqui (*Champion*).

Numerous examples. A well-marked species, easily distinguishable by the three sharply-defined, continuous, ochreous vittæ on the prothorax and elytra, and the elongate first and second joints of the funiculus. Larger than *G. lineellus*, the rostrum very much stouter towards the base, the prothorax more transverse, the prosternal spines short, &c.

20. *Geræus tetrastigma*, sp. n. (Tab. XV. figg. 3, 3 a, ♂.)

Rhomboidal, nigro-piceous, the antennæ and tarsi fusco-ferruginous; somewhat thickly clothed with small, narrow, intermixed brown and whitish scales, the latter clustered into three faint vittæ on the prothorax, a short streak on the second elytral interstice at the apex and another on the fourth near its point of termination, the scales on the elytra arranged in two or three rows down each interstice; the vestiture of the under surface whitish and ochreous intermixed. Head closely punctate; rostrum strongly arcuate, longer than the head and prothorax, rather slender, striate-punctate and also carinate, smoother at the tip, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax transverse, conical, constricted in front; densely, finely, confluent punctate, the narrow interspaces sinuous and rugiform. Elytra triangular, narrowly striate, the interstices flat, broad, and closely punctate, 2 a little wider than the others. Beneath densely punctate; first ventral segment excavate and smoother down the middle. Prosternum armed with two long, porrect spines, and also shallowly sulcate. Anterior tibiæ strongly unguiculate, slightly hollowed towards the apex within.

Length $4\frac{1}{2}$ – $4\frac{7}{8}$, breadth $1\frac{9}{10}$ millim. (♂.)

Hab. MEXICO (*Höge, in coll. Solari*).

Two males, for one of which we are indebted to Signor Solari. The two whitish streaks on each elytron near the apex are conspicuous, and the second dorsal interstice is a little wider than the others. The mandibles are straight on their inner

edge. *G. tetrastigma* approaches *G. trivittatus*, but the vestiture is very differently coloured.

21. *Geræus tæniatus*, sp. n. (Tab. XV. figg. 4, 4 a, ♀.)

Rhomboidal, rather narrow, black; the prothorax with three narrow vittæ (the median stripe continued on to the scutellum and the outer ones extending downwards) and the elytra with a line down the whole length of the fourth interstice, a short streak at the base and apex of the second, and a minute spot at the base of the sixth, thickly clothed with narrow pure white scales; the rest of the vestiture of the upper surface almost entirely black, that of the under surface (a broad space along the upper part of the propleura excepted) close and wholly white, the legs with hair-like white scales. Head finely punctate, shallowly foveate between the eyes; rostrum strongly arcuate, longer than the head and prothorax, rather slender, thickened and closely punctate at the base, the other portion much smoother, the antennæ inserted at a little behind the middle, the antennal club ovate. Prothorax transverse, subconical, scarcely constricted in front, the sides parallel at the base; densely, finely punctate. Elytra triangular, narrowly punctate-striate, the interstices rugulosely punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ rather narrowly separated. Legs moderately long. Length $3\frac{1}{2}$, breadth $1\frac{1}{4}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One female, in very fresh condition. This insect has three narrow sharply-defined vittæ on the prothorax and a line down the whole length of the fourth elytral interstice pure white. The prothorax is short and the elytra triangular. *G. tæniatus* seems to be nearest allied to *G. lineellus* and the male therefore probably has a bispinose prosternum.

22. *Geræus flagellifer*, sp. n. (Tab. XV. figg. 5, 5 a, b, ♀.)

Rhomboid-elliptic, flattened above, shining, black; the elytra and the sides of the prothorax sparsely clothed with narrow, setiform, yellowish-white scales, the scales on the elytra clustered into one or two lines along each interstice, the vestiture of the under surface a little coarser and closer, that of the legs fine. Head finely punctate, transversely grooved between the eyes; mandibles toothed at the base beneath; rostrum strongly arcuate, slightly longer than the elytra, rather slender, widened at the tip, almost smooth, except on each side at the base, the antennæ inserted far behind the middle, the funiculus slender, with joint 1 greatly elongated, about as long as 2-6 united, the club rather narrow, oblong-ovate. Prothorax transverse, with the sides arcuately converging from the base, constricted and narrow in front; the disc sparsely, except along the smooth median space, and the sides densely, punctate. Scutellum oblong-subquadrate. Elytra rounded-triangular, sharply, narrowly striate, the interstices broad, flat, and finely biseriata-punctate. Beneath closely punctate. Prosternum shallowly sulcate down the middle anteriorly. Anterior coxæ separated by about their own width. Tibiæ without visible uncus at the apex.

Length $3\frac{1}{2}$, breadth 2 millim. (♀.)

Hab. NICARAGUA, Chontales (*Janson*).

One female, rather worn. This species has the rostrum strongly arcuate, long, and almost smooth, the basal joint of the funiculus relatively very long, about half the length of the scape, the prothorax bare on the disc, the vestiture of the elytra arranged in one or two lines along each interstice, the tibiæ unarmed at the apex. The male probably has a bispinose prosternum. *G. flagellifer* approaches *G. lineellus*, near which it can be placed for the present.

23. *Geræus crucifer*, sp. n. (Tab. XV. figg. 6, 6 a, ♂.)

Centrinus crucifer, Pilate in litt.

Elliptic, black; densely clothed above and beneath with rather large whitish or brownish-white scales, the prothorax with two vittæ on the disc (sometimes confluent and sometimes each divided into two spots), and often a small spot on each side anteriorly, the scutellum, and the elytra each with a large subquadrate patch on the disc before the middle (extending inwards to the first stria) and a smaller patch towards the apex, these markings usually connected along the sides, fuscous. Head closely punctate; rostrum strongly arcuate, longer than the head and prothorax, moderately stout, rather closely punctate, smoother in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax broader than long, arcuately narrowing from the base, constricted in front; very densely punctate, and sometimes with a smooth raised median line. Elytra rounded-triangular; finely punctate-striate, the interstices densely punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ separated by fully their own width.

♂. Prosternum armed with two compressed conical tubercles, and also excavate between them; first ventral segment depressed down the middle.

Length 3-3½, breadth 1½-1⅞ millim. (♂ ♀.)

Hab. MEXICO, Yucatan (*Dupont*, in *Mus. Brit.*), Temax in N. Yucatan (*Gaumer*).

Sent us in numbers by Mr. Gaumer, but most of the specimens are in bad condition. The markings of the upper surface vary according to the predominance of the whitish or fuscous scales, which are rather large and closely placed, both above and beneath. The prosternal tubercles are small. *Centrinus bicoloratus*, Boh., from Brazil, is an allied form. *G. bicruciatu*s (infra), too, is very like the present species, but it has an unarmed prosternum in the male.

24. *Geræus octomaculatus*, sp. n. (Tab. XV. figg. 7, 7 a, ♀.)

Oblong-elliptic, flattened above, black; thickly clothed with brownish-white scales, the prothorax with two large spots on the disc at the base and a similar spot at the sides before the middle, the scutellum, and the elytra each with a broad transverse fascia on the disc before the middle extending up the side to the base and a subtriangular patch just before the apex (these markings extending inward to the first stria), black. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, rather stout, thickly punctate at the base, the apical half much smoother. Prothorax densely, finely punctate, with a smoother raised median line. Elytra finely punctate-striate, the interstices densely punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ separated by about their own width.

Length 4, breadth 2 millim. (♀.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*).

One female. This is the Vera Cruz form of the Yucatan *G. crucifer*, differing from that insect in its more elongate shape and in the disposition of the dark spots on the prothorax, these being equal in size—two on the disc at the base and one on each side before the middle. The prosternum is doubtless spined in the male.

25. *Geræus perscitus*. (*G. marginatus*, Tab. XV. figg. 8, 8 a, ♂.)

Curculio perscitus, Herbst, Käfer, vii. p. 28, t. 99. fig. 3¹.

Centrinus perscitus, Schönh. Gen. Curc. iii. p. 764²; Lec. Proc. Am. Phil. Soc. xv. p. 312³; Casey, Ann. N. York Acad. Sci. vi. pp. 576, 587⁴.

Elliptic, flattened above, black; densely clothed with small brown scales, with a few scattered white scales

intermixed, the sides of the prothorax broadly, a spot on the shoulder, another on each side of the scutellum, and the base of the suture ochreous or whitish; the vestiture of the under surface similarly coloured. Head densely punctate; rostrum stout, strongly arcuate, a little longer than the head and prothorax, rugulose punctate, the apical half much smoother in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, feebly constricted in front, the sides arcuately converging from the base; densely, very finely punctate. Elytra subtriangular, finely punctate-striate, the interstices densely punctate. Beneath densely, finely punctate. Anterior coxæ separated by about half their own width. Legs short.

♂. Prosternum armed with two short spines, and also excavate between them; anterior tibiæ feebly unguiculate; first ventral segment broadly depressed down the middle.

Length $2\frac{1}{2}$ – $3\frac{1}{2}$, breadth $1\frac{1}{5}$ – $1\frac{3}{5}$ millim. (♂ ♀.)

Hab. NORTH AMERICA ^{1 2}, Georgia and Texas ³, New Jersey and Indiana ⁴.—MEXICO (*Truqui, in Mus. Brit.*), Guanajuato (*Sallé*), Temax (*Gaumer*), Progreso (*U.S. Nat. Mus.*); GUATEMALA, near the city, Capetillo (*Champion*); NICARAGUA, Managua (*coll. Solari*).—ANTILLES, Grenada.

Three males and seven females. Recognizable by the dense brownish vestiture and the broadly ochreous or whitish margins of the prothorax. *G. perscitus* approaches *G. crucifer*, but it has the anterior coxæ much less widely separated.

26. *Geræus hirtipes*, sp. n. (Tab. XV. figg. 9, 9 a, ♂.)

Subrhomboidal, black, the prosternal spines sometimes ferruginous; somewhat thickly clothed with rather coarse cinereous or brownish-white scales, which are arranged in two or three lines along each elytral interstice, the vestiture of the under surface similar. Head closely punctate, obsolete foveate between the eyes; rostrum arcuate, stout, depressed at the base above, longer than the head and prothorax, closely punctate, the apical half smoother and more slender in the ♀, the antennæ inserted near the middle, the antennal club ovate. Prothorax transverse, subconical, feebly constricted in front; densely, confluent punctate, and with indications of a smooth median line. Elytra subtriangular, deeply punctate-striate, the interstices feebly convex, asperate-punctate, each elytron usually with a smoother transverse space on the outer part of the disc at about the middle. Beneath closely punctate. Anterior coxæ narrowly separated. Legs more or less pilose.

♂. Prosternum armed with two long, compressed, upwardly-curved spines, and also excavate between them; first ventral segment broadly depressed down the middle; all the tibiæ within, and the femora beneath, hairy or ciliate, the anterior tibiæ sinuous within and strongly unguiculate at the apex.

Length $3\frac{1}{2}$ – $4\frac{3}{4}$, breadth 2– $2\frac{1}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpam in Vera Cruz (*Sallé*); GUATEMALA, Sinanja in Vera Paz (*Champion*).

Seven specimens, all more or less worn (though the smoother bare spaces on the elytra are probably not abraded), one only (a rubbed ♂) being from Guatemala. The scales on the under surface are not larger than those on the upper surface. The males have the femora and tibiæ much more hairy than the females.

27. *Geræus spiniger*, sp. n. (Tab. XV. figg. 10, 10 a, ♂.)

Rhomboidal, black, the prosternal spines and antennæ fusco-ferruginous; densely clothed with narrow white or brownish-white scales, which are arranged in three or four compact rows down each elytral interstice, the scales on the under surface a little larger, white, completely hiding the sculpture. Head closely punctate; rostrum arcuate, a little longer than the head and prothorax, stout, closely punctate and squamose to the tip, the apical half in the ♀ more slender, bare, and almost smooth, the antennæ inserted at a little beyond (♂) or slightly behind (♀) the middle, the antennal club ovate. Prothorax broader than

long, conical, feebly constricted in front; densely, finely punctate, with indications of a smooth median line. Scutellum almost bare. Elytra triangular, finely punctate-striate, the interstices densely punctate. Beneath densely punctate.

♂. Prosternum armed with two moderately long compressed spinea (reduced to two triangular prominences in one specimen from Capetillo and in another from San Andres Tuxtla); anterior tibiæ narrow, strongly unguiculate, sinuous and clothed with a few very long hairs within, the anterior femora also hairy beneath.

Length $4\frac{1}{5}$ – $4\frac{4}{5}$, breadth $2\frac{1}{10}$ – $2\frac{2}{5}$ millim. (♂ ♀.)

Hab. MEXICO, San Andres Tuxtla, Juquila (*Sallé*), Jalapa (*Höge*); GUATEMALA, near the city (*Salvin*), Capetillo (*Champion*), Coban (*Conradt*).

Five males and nine females. Distinguishable from *G. hirtipes* and allied forms with bispinose prosternum in the male by the dense vestiture, above and beneath. The anterior tibiæ of the male are narrow, sinuous within, and clothed with long hairs.

28. *Geræus triplaris*, sp. n.

Broad, rhomboidal, shining, black, the antennæ and tarsi piceous; above (the base of the rostrum included) closely, uniformly clothed with narrow, hair-like, white scales, those on the elytra setiform and arranged in about three rows along each interstice, the scales on the under surface larger and also white, the tibiæ set with short brown hairs at the apex. Head closely punctate, transversely depressed between the eyes; rostrum arcuate, longer than the head and prothorax, depressed at the base above, the short basal portion much thickened and rugosely punctate, the other portion bare, flattened, very sparsely punctate, and rather slender, the antennæ inserted at about the basal third, the antennal club ovate, stout. Prothorax broader than long, subconical, strongly constricted in front, the sides rounded anteriorly, the base deeply bisinuate; densely, finely, confluent punctate, and with an incomplete, smooth, raised median line. Scutellum narrow, triangular, smooth. Elytra subtriangular, narrowly punctate-striate, the interstices broad, flat, and densely asperate-punctate. Beneath densely punctate. Prosternum slightly depressed down the middle. Anterior coxæ rather narrowly separated. Legs comparatively stout; tibiæ widened and strongly unguiculate at the apex; tarsal claws long and divergent.

Length $5\frac{3}{4}$, breadth $3\frac{1}{8}$ millim. (♀.)

Hab. MEXICO, Jalapa (*Höge*).

One female in very fresh condition. A broad, rhomboidal form, with the white vestiture of the upper surface close, fine, and uniformly arranged; the scutellum narrow and glabrous; the rostrum greatly thickened and rugose at the base; the mandibles short. Larger, broader, and more robust than *G. spiniger*, the vestiture sparser, above and beneath, hair-like on the elytra, the antennal club larger, the rostrum longer, &c. The prosternum is doubtless bispinose in the male.

29. *Geræus sinuatipes*, sp. n. (Tab. XV. fig. 11, anterior tibia, ♂.)

Subrhomboidal, rather narrow, black or piceous, the tip of the rostrum ferruginous; somewhat thickly clothed with narrow brownish-white scales, which are clustered into two or three lines down each elytral interstice (the first with one line only from about the basal third), the vestiture of the under surface closer and paler. Head finely punctate; rostrum arcuate, longer than the head and prothorax, stout, tapering towards the tip, closely punctate, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax transverse, subconical, feebly constricted in front; densely punctate. Scutellum squamose. Elytra subtriangular, sharply punctate-striate, the interstices rugulosely punctate. Beneath densely punctate. Prosternum with a transverse depression in the subapical groove.

♂. Prosternum armed with two short upwardly-curved spines, and also slightly hollowed between them: anterior tibiæ strongly unguiculate, dilated on the inner side near the base and hollowed thence to the apex, sparsely ciliate within.

Length $3\frac{3}{4}$, breadth $1\frac{9}{10}$ —2 millim. (♂.)

Hab. MEXICO, Juquila (*Sallé*); GUATEMALA, Capetillo (*Champion*).

Three males, all a little worn. Two females in better condition from Amula (*H. H. Smith*), with the apical half of the rostrum bare and sparsely punctate, may also belong here. Smaller, narrower, and more sparsely squamose than *G. spiniger*, the scutellum clothed with scales, the anterior tibiæ (♂) dilated near the base and clothed with shorter hairs, the femora without long hairs beneath. The bispinose prosternum separates *G. sinuatipes* from *G. tonsilis*, &c.

30. *Geræus gracilis*, sp. n.

Subrhomboidal, narrow, black, the antennæ, mandibles, and tarsi obscure ferruginous; thickly clothed with narrow white or brownish-white scales, which are arranged in two or three rows down each interstice, the scales on the under surface pure white, larger, and more closely placed. Head sparsely punctate; rostrum arcuate, longer than the head and prothorax, moderately stout, closely punctate—the apical half in the ♀ more slender, bare, flattened, and almost smooth,—the antennæ inserted at (♂) or behind (♀) the middle, the antennal club ovate. Prothorax transverse, subconical, densely punctate. Scutellum almost bare. Elytra subtriangular, finely punctate-striate, the interstices densely, rugulose punctate. Beneath densely punctate. Anterior coxæ narrowly separated.

♂. Prosternum armed with two slender spines; first ventral segment shallowly depressed down the middle, the fifth with a transverse, almost bare excavation; anterior tibiæ narrow, strongly unguiculate, sinuate within.

Length $2\frac{4}{5}$ — $3\frac{1}{8}$, breadth $1\frac{1}{4}$ — $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo, Amula (*H. H. Smith*: ♂ ♀), Temax in N. Yucatan (*Gaumer*: ♂).

Five males and one female. A small, narrow form with uniform whitish vestiture, the scutellum almost bare, the prosternum armed with two slender spines in the male.

31. *Geræus spinipectus*, sp. n.

Subrhomboidal, narrow, black or piceous; above rather sparsely clothed with small, narrow, yellowish-white scales, which are arranged in two or three rows down each elytral interstice, the vestiture of the under surface coarser, denser, and wholly whitish. Head finely punctate; rostrum arcuate, much longer than the head and prothorax, moderately stout, slightly thickened towards the base, closely punctate, the antennæ inserted at about the middle. Prothorax short, subconical, constricted in front; densely, finely punctate, with indications of a smooth median line. Elytra subtriangular, narrowly punctate-striate, the interstices rugulose punctate. Beneath densely punctate; first ventral segment broadly depressed down the middle, the fifth not excavate. Prosternum armed with two moderately long, slender, porrect spines. Anterior tibiæ narrow, unguiculate at the apex.

Length $3\frac{1}{5}$ — $3\frac{1}{3}$, breadth $1\frac{1}{2}$ — $1\frac{2}{3}$ millim. (♂.)

Hab. GUATEMALA, near the city (*Salvin*).

Three specimens, one rather immature. Closely related to the Mexican *G. gracilis*, but with a relatively shorter prothorax and finer vestiture above, the fifth ventral segment of the male unimpressed, the prosternal spines longer. This last-mentioned character separates *G. spinipectus* from various other similar forms.

32. *Geræus convexiusculus*, sp. n.

Subrhomboidal, rather convex, shining, black, the extreme tip of the rostrum ferrugineous; above thickly and uniformly clothed with narrow whitish scales, those on the elytra arranged in two or three rows down each interstice (the first interstice with one row only from a little below the base); the under surface densely set with larger white scales. Head closely punctate; rostrum much longer than the head and prothorax, strongly arcuate, stout, squamose and closely punctate to the tip in the ♂, the apical half somewhat flattened, bare, and much smoother in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax much broader than long, rapidly and arcuately narrowing from the base, constricted in front; densely, finely, confluent punctate. Scutellum punctate and squamose. Elytra rather short, subtriangular; finely punctate-striate, the interstices rugulose. Beneath densely punctate. Prosternum armed with two short spines in the ♂. Tibiæ strongly unguiculate, especially in the ♂, the anterior pair slightly hollowed on the inner side towards the apex in this sex.

Length $2\frac{1}{2}$ –3, breadth $1\frac{2}{5}$ – $1\frac{3}{5}$ millim. (♂ ♀.)

Hab. GUATEMALA, Capetillo (*Champion*).

Three males and two females. A comparatively short, convex form, with uniform whitish vestiture, the male with a long, stout, squamose rostrum and two short prosternal spines, the tibiæ strongly unguiculate in this sex. Broader and more convex than *G. gracilis*, the scutellum squamose, the prosternal spines stouter, the anterior tibiæ of the male less sinuate within*.

33. *Geræus bituberculatus*, sp. n.

Oblong-rhomboidal, narrow, flattened above, dull, black or piceous; above clothed with small, narrow, black or brown scales, with a few scattered white scales intermixed, the vestiture of the under surface closer, coarser, and wholly white, that of the legs also whitish. Head closely punctate; rostrum strongly arcuate, rather longer than the head and prothorax, stout, tapering towards the tip, coarsely punctate at the base, sparsely so towards the apex, the antennæ inserted at the middle, the antennal club ovate. Prothorax transverse, conical, densely, finely punctate. Scutellum oblong, narrow. Elytra rather long, subtriangular; finely punctate-striate, the interstices densely punctate. Beneath densely punctate; first ventral segment flattened down the middle. Prosternum armed with two small, compressed, conical tubercles. Legs rather long; anterior tibiæ narrow, sinuous and finely ciliate within, armed at the apex with a long claw.

Length $3\frac{1}{2}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{3}{5}$ millim. (♂.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Chilpancingo (*H. H. Smith*).

Two males, one somewhat immature and found many years ago by Truqui, the two agreeing perfectly *inter se*. The fine dark vestiture of the upper surface, with a few white scales intermixed, the bituberculate prosternum, and the unusually long claw of the anterior tibiæ, distinguish *G. bituberculatus*, at least in the male sex.

34. *Geræus perscillus*.

Centrinus perscillus, Gyll. in Schönh. Gen. Curc. iii. p. 762¹; Casey, Ann. N. York Acad. Sci. v. pp. 575, 584².

? *Centrinus perscillus*, Lec. Proc. Am. Phil. Soc. xv. p. 310³.

Hab. NORTH AMERICA¹, Kansas³ and Minnesota².—MEXICO, Presidio (*Forrer*), Cordova, Jalapa (*Höge*); BRITISH HONDURAS, R. Sarstoon (*Blancaneaux*).

* *Centrinus biserialis*, Kirsch, from Peru, is an allied form with finer vestiture, less prominent humeri, &c.

Five males and three females are somewhat doubtfully referred to this species, a N.-American specimen of which has been sent me by Casey under the name *C. perscitus*. The males have a conical tubercle in front of each anterior coxa, the anterior coxæ separated by about their own width, the anterior tibiæ rather broad and very feebly unguiculate, the first ventral segment without a barer space in the middle. The vestiture is dense and uniformly coloured.

35. *Geræus picumnus*.

Curculio picumnus, Herbst, Käfer, vii. p. 30, t. 99. fig. 9¹.

Baridius picumnus, Say, Descr. N. Am. Curc. p. 17²; ed. Leconte, i. p. 281³.

Centrinus picumnus, Schönh. Gen. Curc. viii. 1, p. 221⁴.

Centrinus olivaceus, Gyll. in Schönh. Gen. Curc. iii. p. 763⁵; Lec. Proc. Am. Phil. Soc. xv. p. 311⁶; Casey, Ann. N. York Acad. Sci. vi. pp. 575, 581⁷.

Centrinus sutor, Harris, Trans. Hartford Nat. Hist. Soc. i. p. 81⁸.

Hab. NORTH AMERICA^{1-6 8}, New York to Florida and Arizona⁷.—MEXICO (*Truqui*), San Rafael Jicaltepec (*U.S. Nat. Mus.*), Teapa (*H. H. Smith*), Yucatan (*Gaumer*); GUATEMALA, San Gerónimo, Chiacam, Senahu, and San Juan in Vera Paz (*Champion*); NICARAGUA, Chontales (*Janson*), Managua (*Solari*); COSTA RICA, Reventazon (*Biolley*); PANAMA, Tabernilla (*U.S. Nat. Mus.*), Taboga I. (*Champion*).

Specimens from the above-quoted localities agree with others from the United States sent me by Casey and Wickham as *G. picumnus*. They have the flanks of the prothorax excavate behind the eyes; the vestiture close, fine, and uniformly coloured; the males with the prosternum deeply excavate and armed with two curved slender spines, the anterior tibiæ without visible uncus at the apex, and the first ventral segment with a large, rounded, sparsely squamose space in the middle. The mandibles are toothed at the base beneath.

36. *Geræus managuensis*, sp. n.

Subelliptic, piceous, the rostrum, antennæ, and legs obscure ferruginous; somewhat thickly and uniformly clothed with small, hair-like, yellowish-white scales, which are arranged in two rows down each elytral interstice, the first with one line only; the vestiture of the under surface closer and pure white. Head closely punctate, faintly foveate between the eyes; rostrum rather slender, strongly arcuate, a little longer than the head and prothorax, the basal half closely, and the rest more finely and sparsely, punctate, smoother in the ♀, the antennæ inserted near the middle in the ♂ and at about the basal third in the ♀, the club ovate. Prothorax short, conical, feebly constricted in front, the basal lobe entering the scutellar cavity; densely, finely punctate. Scutellum very small, squamose. Elytra rounded-triangular, the humeri not prominent; finely and sharply striate, the interstices rugulose punctate. Beneath densely punctate. Prosternum of the ♂ shallowly sulcate and armed with two very small conical tubercles, which are almost hidden by the vestiture. Anterior coxæ distant. Legs short; anterior tibiæ without visible uncus in either sex.

Length $1\frac{3}{4}$ –2, breadth $\frac{9}{10}$ –1 millim. (♂ ♀.)

Hab. NICARAGUA, Managua (*Solari*).

One pair. Smaller than *G. picumnus*, the vestiture of the elytra sparser, the

prothorax conical, the scutellum minute, the prosternal prominence of the male small and almost hidden by the vestiture. One of the smallest of the Central-American Centrinids.

37. *Geræus lentiginosus*. (Tab. XV. figg. 12, 12 a, ♂.)

Centrinus lentiginosus, Boh. in Schönh. Gen. Curc. viii. 1, p. 221¹.

Elliptic, nigro-piceous or black, the antennæ, legs, and apical half of the rostrum more or less ferruginous; thickly clothed with narrow ochreous or cinereous scales, which are arranged in two or three close rows down each elytral interstice, the elytra usually with a common light or dark brown spot on the suture beyond the middle and a faint brownish spot on the disc in a line with it; the vestiture of the under surface closer, coarser, and whiter. Head closely punctate; rostrum strongly arcuate, nearly half the length of the body, moderately stout, squamose, thickly punctate, and subcarinate in its basal half and sparsely punctured thence to the tip, the apical half much smoother in the ♀, the antennæ inserted at about the middle, the antennal club ovate and rather small. Prothorax transverse, arcuately narrowing from the base, feebly constricted in front; densely, finely punctate. Scutellum squamose. Elytra finely striate, the interstices densely rugulose. Prosternum squamose, more or less sulcate in the ♂, usually armed in the ♂ with two short, downwardly-directed, conical tubercles, which in fully-developed examples are produced into moderately long, curved, slender spines. Anterior tibiæ in the ♂ strongly, in the ♀ feebly unguiculate, hollowed within in the ♂.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{2}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*), Orizaba (*coll. Chevrolat*¹, *H. H. Smith*), Toxpam (*Sallé*), Atoyac (*H. H. Smith*), Cordova, Jalapa (*Höge*), Cuernavaca (*U.S. Nat. Mus.*), Teapa (*Höge*, *H. H. Smith*); GUATEMALA, Cerro Zunil, Zapote, Capetillo, Guatemala City, San Gerónimo, Sabo (*Champion*), Trece Aguas (*U.S. Nat. Mus.*); COSTA RICA (*coll. Solari*), San José, Caché (*Biolley*), San Carlos, Zent (*U.S. Nat. Mus.*).

This is one of three species standing under the name *Centrinus lentiginosus* in the Sallé collection, and the one that agrees best with Boheman's description, which must have been taken from an immaculate example, most of our specimens having a brown spot on the suture beyond the middle. The prosternal spines, which are sometimes obsolete, are rather long and curved in several of the Costa Rican examples, and short and tuberculiform in most of those from Mexico, the median sulcus varying in depth according to the development of the spines.

38. *Geræus simulator*, sp. n.

Elliptic, rather narrow, nigro-piceous or piceous, the antennæ and legs usually more or less rufescent; somewhat sparsely clothed with narrow ochreous or cinereous scales, the elytra with intermixed fuscous scales, which are often condensed into a common transverse patch at the middle of the suture, a small spot on each side of it, and another on the disc near the apex, the elytral vestiture usually arranged in double or treble lines down the interstices 2, 4, and 6, and in a single line on the others; the under surface uniformly clothed with ochraceous or whitish scales. Rostrum a little longer than the head and prothorax, strongly arcuate, stout, closely punctate and subcarinate, scarcely smoother in the ♀. Prothorax transverse, narrowing from the base, densely punctate. Elytra narrowly punctate-striate, the interstices rugulose punctate. Prosternum deeply sulcate in the ♂, almost unimpressed behind the transverse subapical groove in the ♀, armed in the ♂ with two spines or conical tubercles, the spines in well-developed examples stout and curved. Anterior tibiæ sharply unguiculate in both sexes.

Length 2– $2\frac{1}{2}$, breadth 1– $1\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Jalapa (*Höge*), Toxpam (*Sallé*), Teapa (*Sallé*, *H. H. Smith*); GUATEMALA, Trece Aguas (*U.S. Nat. Mus.*).

Found in numbers at Teapa. Smaller, narrower, and more sparsely squamose than *G. lentiginosus*; the rostrum stouter, especially in the male; the elytra with numerous intermixed fuscous scales, which are usually condensed into a common transverse spot at (instead of beyond) the middle of the suture, the vestiture arranged in from one to three lines on the alternate interstices and in single lines on the others; the prosternal spines stouter in well-developed males. Narrower and more sparsely squamose than *G. metæcus*, the anterior tibiæ sharply unguiculate in the male. Three specimens from Chiacam with darker legs and closer vestiture may also belong here. The mandibles are slightly decussate at the tip.

39. *Geræus metæcus*, sp. n.

Elliptic, nigro-piceous or piceous, the antennæ, tibiæ, tarsi, and tip of the rostrum more or less ferruginous; thickly clothed with rather coarse, narrow, intermixed ochreous (or cinereous) and fuscous scales, the light-coloured scales condensed into three broad faint vittæ on the prothorax and various short streaks on the elytra (especially at the base of the first and second interstices); the vestiture of the under surface closer and whitish. Rostrum stout, half the length of the body, abruptly bowed from near the base, thickly punctate and subcarinate in its basal half and more sparsely punctured thence to the tip. Prothorax and elytra sculptured as in *G. lentiginosus*. Prosternum deeply sulcate in the ♂, shallowly so in the ♀, armed in the ♂ with two moderately long spines, which in one specimen are reduced to two small conical tubercles. Anterior tibiæ obsoletely unguiculate in both sexes, not hollowed within in the ♂.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{3}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Cahabon (*Champion*), Trece Aguas (*U.S. Nat. Mus.*); NICARAGUA, Chontales (*Janson*).

Four males and five females. Very like *G. lentiginosus*, and likely to be confounded with it, but separable by the very feebly unguiculate, non-emarginate anterior tibiæ of the male, and the mottled elytral vestiture. The obsoletely unguiculate anterior tibiæ also distinguishes *G. metæcus* from other nearly allied forms. There is sometimes a transverse dark mark at the middle of the suture, as in *G. simulator*.

40. *Geræus amplicollis*, sp. n. (Tab. XV. figg. 13, 13 a, ♂.)

Subovate, rather convex, nigro-piceous, the elytra, rostrum, antennæ, and legs fusco-castaneous; above sparsely clothed with minute, pallid, hair-like scales, the elytra with an oblong patch of coarser whitish scales at the base of the third interstice, the under surface also sparsely albo-squamose. Head closely punctate; rostrum strongly arcuate, about as long as the head and prothorax, rather stout, thickened towards the base, closely, coarsely punctate, the apical half almost smooth in the ♀, the antennæ inserted at about the middle, the antennal club short-ovate, stout. Prothorax somewhat convex, strongly transverse, rounded at the sides, narrow and tubulate in front; rather coarsely, densely punctate (the punctures not coarser on the anterior lobe), and with indications of a raised median line. Scutellum transverse. Elytra subtriangular, transversely depressed on the disc beyond the middle, sharply striate, the interstices broad and closely, coarsely punctate. Beneath closely punctate. Anterior tibiæ almost straight on their inner edge.

♂. Prosternum armed with two short, stout, upwardly-curved spines, and with a circular cavity between them; first ventral segment broadly depressed down the middle.

Length $4\frac{1}{4}$ – $5\frac{1}{8}$, breadth $2\frac{1}{8}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Xucumanatlan in Guerrero, 7000 feet (*H. H. Smith*).

Two males and one female, all somewhat abraded. Larger and broader than *G. pugnax*, the prothorax broader and more rounded at the sides, the rostrum a little shorter and stouter, the puncturing of the upper and under surfaces not so coarse, that of the elytral interstices less asperate, the vestiture coarser beneath and finer above, the tibiæ more feebly unguiculate in the male. *G. striatirostris*, Lec., from Texas, is also a nearly allied form.

41. *Geræus coarctatus*, sp. n. (Tab. XV. fig. 14, ♀.)

Oblong-ovate, rather broad, black, the tarsi paler; somewhat thickly clothed with short, fine, hair-like, cinereous scales, the scales on the prothorax longer and transversely arranged, and those on the elytra placed in from 2–4 rows down each interstice; the vestiture of the under surface coarser and also cinereous. Head finely punctate, transversely grooved between the eyes; rostrum stout, strongly arcuate, slightly longer than the head and prothorax, very sparsely, finely punctate, the punctures becoming coarser and more crowded at the sides towards the base, the antennæ inserted at about the middle, the antennal club short-ovate, stout. Prothorax broad, transverse, rounded at the sides, and strongly constricted in front; densely, finely, confluent punctate, except along the narrow smooth median face, the short tubulate anterior lobe coarsely and rugosely punctured. Elytra rather long, gradually narrowing from the base; shallowly and narrowly punctate-striate, the interstices broad, flat, and densely punctate. Beneath densely punctate. Prosternum depressed down the middle anteriorly, the transverse subapical sulcus deep. Legs rather short, the femora stout, clavate, the tibiæ strongly unguiculate.

Length $5\frac{1}{8}$, breadth $2\frac{2}{3}$ millim. (♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*).

Two females. Closely related to *G. amplicollis*, and with the prothorax very similarly shaped; but with the rostrum less thickened at the base, the elytra more oblong and unimpressed, with the striæ conspicuously punctate, the prothorax more densely and not so coarsely punctate (except along the smooth median line), its anterior lobe subfoveolate, the vestiture fine and uniformly distributed. The prosternum is probably spined in the male.

42. *Geræus duplaris*, sp. n.

Oblong-rhomboidal, black; somewhat thickly clothed with short, narrow, setiform, whitish scales, which are arranged in a double series along each elytral interstice, the vestiture of the prothorax finer, hair-like, and transversely arranged, that of the under surface rather coarse. Head finely punctate, transversely grooved between the eyes; rostrum a little longer than the head and prothorax, abruptly curved downward from near the base, the basal portion thickened and rugosely punctate, the apical portion flattened and almost smooth, the antennæ inserted far behind the middle, the antennal club ovate. Prothorax broader than long, narrowing from the base, slightly rounded at the sides anteriorly, constricted in front; densely, finely, confluent punctate, the narrow interspaces raised into sinuous longitudinal ridges, the disc with an incomplete raised median line. Elytra moderately long, gradually narrowed from the base, punctate-striate, the interstices closely asperate-punctate. Beneath closely punctate. Prosternum rather broadly sulcate down the middle anteriorly. Anterior coxæ narrowly separated.

Length $4\frac{2}{5}$ – $4\frac{1}{2}$, breadth $2\frac{1}{8}$ millim. (♀.)

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Hab. GUATEMALA, San Gerónimo in Baja Vera Paz (*Champion*).

Two females. This insect is of about the same size and shape as the Mexican *G. iners*, but the vestiture is much finer, the elytral interstices are flat and closely punctate, &c. It is narrower than *G. coarctatus*, the prothorax is narrowed from the base, and the elytral interstices are rugosely punctate, each with two lines of short, fine, setiform scales. The prosternum is perhaps spined in the male.

43. *Geræus albolineatus*, sp. n. (Tab. XV. figg. 15, 15 *a*, ♂; 16, 16 *a*, ♀, var.)

Oblong-rhomboidal, very shining, black; the prothorax with the outer margins and hind angles, the elytra with various elongate streaks on the alternate interstices 2, 4, 6, 8 (sometimes extending down their entire length) and a spot at the base of the third, and the under surface, densely clothed with coarse, oblong, pure white scales, the legs and rostrum with finer white scales, the rest of the upper surface (a few scattered scales excepted) in great part bare. Head finely punctate, transversely depressed between the eyes; rostrum (♂) long, strongly arcuate, moderately stout, thickly punctate to the tip, (♀) more elongate, somewhat gibbous at the base, and with the apical two-thirds slender and almost smooth, the antennæ inserted at (♂) or behind (♀) the middle, joint 2 of the funiculus a little longer than 3, the club ovate. Prothorax transverse, narrowing from the base, strongly constricted in front; very finely punctate, except along a narrow median space, the punctures confluent along the sides and on the flanks. Scutellum small, transverse, bare. Elytra moderately long, narrowing from the base; narrowly and sharply striate, the striæ feebly punctate, the interstices broad and flat, the squamigerous spaces punctulate. Beneath densely punctate.

Var. The white streaks on the elytra less elongate, and tending to form three interrupted fasciæ—one at the base, another beyond the middle, and a third at the apex; the white scales on the prothorax sometimes extending across the base. (Fig. 16.)

♂. Prosternum armed with two moderately long spines and with a deep fovea between them, or with two tubercles and a shallow excavation; first ventral segment depressed down the middle.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth $1\frac{2}{3}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Toxpan (*Sallé*: ♂ ♀), Atoyac (*H. H. Smith*: ♀), Oaxaca (*Höge*: ♂); GUATEMALA, Capetillo (*Champion*: ♂); COSTA RICA, San José (*U.S. Nat. Mus.*); PANAMA, Volcan de Chiriqui (*Champion*: ♀).

A variable insect. Of the fourteen specimens seen, nine are from Mexico (four having the white lines continuous on the elytra); the others belong to the varietal form, the male from Guatemala being a small narrow example with the prosternal spines reduced to two tubercles.

44. *Geræus x-notatum*, sp. n. (Tab. XV. figg. 17, 17 *a*, ♀.)

Oblong-rhomboidal, narrow, shining, black, the antennal club and the tip of the rostrum ferruginous; the prothorax with a space along the sides, and the elytra with a transverse fascia at the base and a broader oblique one beyond the middle, the two fasciæ connected along the suture, somewhat thickly clothed with narrow white scales; the under surface, the basal portion of the rostrum, and the legs also clothed with small white scales, these becoming coarser and denser on the prosternum and on the meso- and metasternal side-pieces. Head finely punctate, transversely depressed between the eyes; rostrum long, abruptly bent downward near the base, the basal portion stout, somewhat gibbous, and thickly punctate at the sides, the apical portion feebly curved, flattened, rather slender, and almost smooth, the antennæ inserted behind the middle, joint 2 of the funiculus twice as long as 3, the club short-ovate. Prothorax transverse, subconical, constricted in front; closely punctate, except along the middle, the punctures confluent at the sides. Scutellum transverse. Elytra subtriangular, deeply striate, the striæ feebly

punctate, the interstices flat and with the squamigerous spaces finely punctate. Beneath densely, finely punctate. Prosternum foveate behind the transverse subapical groove. Legs rather long and slender. Length $2\frac{9}{10}$ – $3\frac{1}{10}$, breadth $1\frac{1}{4}$ – $1\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Chilpancingo and Amula in Guerrero 4600–6000 feet (*H. H. Smith*).

Two females. Smaller than the same sex of *G. albolineatus*, the white scales on the elytra clustered into a common Σ -shaped mark, the vestiture of the metasternum and abdomen finer, the apical portion of the rostrum flattened and less curved, the second joint of the funiculus more elongate. There are a few scattered white scales on the elytra beyond the post-median fascia.

45. *Geræus tumidirostris*, sp. n. (Tab. XV. figg. 18, 18 a, ♂.)

Oblong-rhomboidal, black, shining; the elytra with a line of scattered, oblong, white scales along each interstice (becoming double at the base and often in part abraded), the prothorax with a few hair-like smaller scales; the under surface thickly, the legs more sparsely, albo-squamose. Head closely punctate, transversely depressed between the narrowly-separated eyes; rostrum long, curved, thickened and abruptly bent downward near the base (appearing gibbous when viewed in profile), coarsely punctate in the ♂, the long apical portion flattened, more slender and almost smooth in the ♀, the antennæ inserted at (♀) or a little beyond (♂) the middle, joints 1 and 2 of the funiculus elongate, 2 shorter than 1, the club ovate. Prothorax nearly as long as broad, narrow, conical, feebly constricted in front; densely, rather coarsely punctate, smooth along the median line. Elytra triangular, long, much wider than the prothorax, transversely depressed on the disc beyond the middle and also below the base, the suture also depressed anteriorly; deeply punctate-striate, the interstices almost flat and irregularly uniseriate-punctate. Beneath densely punctate. Prosternum narrowly sulcate. Anterior coxæ narrowly separated. Legs rather elongate.

♂. Prosternum armed with two moderately long porrect spines; first ventral segment slightly depressed down the middle.

Length $4\frac{1}{5}$ – $5\frac{1}{2}$, breadth $2\frac{1}{5}$ – $2\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, Sinanja and Sabo in Alta Vera Paz, Atlantic slope (*Champion*).

Found in numbers at Sinanja. A peculiar form, with the upper surface shining, the under surface densely albo-squamose, the prothorax almost bare and conical, the elytra long, triangular, and clothed with scattered white scales, the rostrum thickened and gibbous at the base in both sexes.

46. *Geræus scabripennis*, sp. n.

Oblong-rhomboidal, black, the prothorax shining, the rest of the surface duller; above very sparsely (elytra abraded), beneath thickly, clothed with white scales. Head closely punctate; rostrum moderately long, slightly thickened towards the base, regularly arcuate throughout, coarsely punctate, smoother and widened at the tip, the antennæ inserted at a little beyond the middle, the antennal club stout, oblong-ovate. Prothorax broader than long, conical, constricted in front; densely, finely, shallowly punctate, smoother and flattened on the disc towards the base, and with indications of a raised median line. Elytra triangular, long, much wider than the prothorax; finely punctate-striate, the interstices flat and densely rugulose. Beneath densely punctate. Prosternum narrowly sulcate, armed with two very long porrect spines. First ventral segment broadly depressed down the middle. Third tarsal joint large.

Length 5, breadth $2\frac{1}{3}$ millim. (♂.)

Hab. MEXICO, Guanajuato (*Sallé*).

One male, with the elytra much abraded. This is the Mexican representative of the Guatemalan *G. tumidirostris*, differing from that insect in the regularly arcuate, non-tumid rostrum, the finely striate, unimpressed elytra, with densely rugulose interstices, the larger third tarsal joint, and the longer prosternal spines of the male. The conical, narrow prothorax, narrow prosternal sulcus, &c., separate *G. scabripennis* from worn *G. senilis* and allied forms.

47. *Geræus gentilis*, sp. n. (Tab. XV. figg. 19, 19 a, ♂.)

Rhomboidal, narrow, shining, nigro-piceous, the antennæ, tip of the rostrum, prosternal spines, tibiæ, and tarsi more or less ferruginous; very sparsely clothed with whitish, setiform scales, those on the elytra regularly arranged in a single row along each interstice, the metathoracic episterna closely albo-squamose. Head closely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, as long as the elytra, seriate-punctate and feebly carinate, the antennæ inserted at the middle, the antennal club ovate. Prothorax a little broader than long, conical; sparsely, obsoletely punctate on the disc, the punctuation becoming coarser and confluent at the sides. Scutellum subquadrate, narrow. Elytra triangular, deeply punctate-striate, the interstices narrow and uniseriate-punctate. Beneath closely punctate. Prosternum narrowly sulcate and armed with two long, slender, compressed spines. First ventral segment depressed down the middle. Anterior coxæ very narrowly separated. Legs rather long and slender; anterior tibiæ strongly, the other tibiæ more feebly, unguiculate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One male. A small species, rhomboidal in form, with a conical prothorax, which is almost smooth along the middle of the disc, a strongly arcuate, stout rostrum, and a single regular line of whitish setiform scales down each elytral interstice, the prosternum armed with two long, narrowly separated spines, and the legs comparatively long and slender. *G. gentilis* has somewhat the facies of the N.-American *Centrinus capillatus*, Lec.

48. *Geræus sculpticollis*, sp. n. (Tab. XV. figg. 20, 20 a, ♂.)

Oblong-subrhomboidal, shining, black; the upper surface set with a few scattered, coarse, oblong white scales intermixed on the elytra with fine, hair-like, fuscous scales, the larger scales condensed into small spots at the base and apex of the prothorax, and at the base of the elytra and also along their third interstice towards the tip; the under surface thickly, the legs more sparsely, albo-squamose, the tibiæ hairy within. Head finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, rather stout, about as long as the elytra, thickened towards the base, coarsely punctate, the antennæ inserted at the middle, the antennal club ovate. Prothorax broader than long, abruptly constricted and narrow in front, the sides rounded from near the base; rather coarsely, confluent punctate, the narrow interspaces raised into sinuous longitudinal ridges, and with a smooth raised median line. Elytra long, triangular, depressed along the suture; deeply punctate-striate, the interstices flat and irregularly biseriate-punctate. Beneath densely punctate. Prosternum sulcate and armed with two moderately long, slightly curved, downwardly-directed spines. First ventral segment broadly depressed down the middle. Anterior coxæ narrowly separated. Legs rather elongate, the anterior pair especially; anterior tibiæ curved, strongly unguiculate at the apex.

Length $4\frac{1}{2}$ -5, breadth $2\frac{1}{5}$ - $2\frac{1}{4}$ millim. (♂.)

Hab. MEXICO, Amula in Guerrero 6000 feet (*H. H. Smith*).

Two males, varying in the curvature of the prosternal spines. An isolated form, distinguished by the shining, very sparsely squamose upper surface (the larger pure white scales being scattered along the elytral interstices and clustered into small spots at their base and apex), the albo-squamose under surface, the rugose, tubulate prothorax, the long, triangular elytra, &c.

49. *Geræus curvispinis*, sp. n. (Tab. XV. figg. 21, 21 a, ♂.)

Subrhomboidal, rather dull, the elytra shining, black, the antennæ obscure ferruginous; the vestiture very sparse, fine, and whitish, a little closer on the under surface and legs and arranged in lines on the elytra. Head finely punctate, with a deep transverse groove between the eyes; rostrum strongly and abruptly arcuate from the base, nearly as long as the elytra, moderately stout, sparsely, coarsely punctate, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax slightly broader than long, abruptly narrowed and tubulate in front, the sides rounded anteriorly and gradually converging from the base; densely punctate, the narrow interspaces raised into long oblique ridges, the disc with a distinct median carina. Elytra triangular, depressed along the suture anteriorly; sharply punctate-striate, the interstices flat and asperato-punctate. Beneath densely punctate, the propleura coarsely strigose. Prosternum deeply excavate and armed with two moderately long spines, which are directed downward at the base and abruptly curved upward towards the tip. First ventral segment broadly depressed down the middle. Legs rather elongate.

Length $4\frac{1}{2}$, breadth $2\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Cordova (*Sallé*).

One male, rather worn. This insect has the prothorax sculptured as in various species of *Rhyssomatus*, the prosternal spines directed downward at the base and curved upward from about the middle, and the rostrum long and abruptly arcuate from the base. *G. curvispinis* is nearly related to *G. sculpticollis*, differing from it in the sculpture of the prothorax (the oblique rugæ being much more extended), the more curved, smoother, and shorter rostrum, the deeply excavate prosternum, the less elongate form, finer and sparser vestiture, &c.

50. *Geræus tenebricosus*, sp. n. (Tab. XV. figg. 22, 22 a, ♂.)

Broad, subrhomboidal, opaque, black, the entire surface very densely punctate, the punctures on the elytra transversely confluent and set with minute, narrow, decumbent, fuscous scales. Rostrum a little longer than the head and prothorax, stout, the apical half flattened and more slender, coarsely striate-punctate, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, rounded at the sides, constricted and much narrowed in front, with indications of a smooth median line. Elytra triangular, narrowly punctate-striate, the interstices broad and flat. Prosternum flattened down the middle, armed with two conical tubercles. First ventral segment broadly excavate in the middle posteriorly, the suture between it and the second segment strongly sinuate. Anterior coxæ separated by a little less than, the intermediate pair by about twice, their own width. Legs rather short; tibiæ broad, strongly unguiculate, the anterior pair sinuous within.

Length $5\frac{7}{8}$, breadth $3\frac{1}{4}$ millim. (♂.)

Hab. MEXICO, Tasco in Guerrero (*ex coll. Flohr*).

One male. Larger and broader than *G. pugnax* (Boh.), densely and rugulosely punctate above and beneath, opaque, the fuscous vestiture so fine as to be scarcely visible at first sight, the prosternum not excavate and armed with two conical tubercles,

the anterior tibiæ broad and sinuous within; on the under surface a few narrow scales are to be seen: *G. tenebricosus* also resembles *Prionobaris asper*, but it is much larger, the tibiæ are not serrate, &c.

51. *Geræus pugnax*. (Tab. XV. figg. 23, 23 a, ♂.)

♀. *Centrinus pugnax*, Boh. in Schönh. Gen. Curc. viii. 1, p. 214¹.

♂. Prosternum armed with two short upwardly-curved spines, and with a deep heart-shaped excavation extending forward to the subapical constriction; first ventral segment flattened down the middle.

♀. Prosternum with a smooth, deep, transverse fovea in the subapical groove.

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), ?Tultepec [Toulcepec¹] (*coll. Chevrolat*), Orizaba (*F. D. Godman*), Toxpam, Capulalpam (*Sallé*), Cordova, Jalapa (*Höge*), Venta de Zopilote (*H. H. Smith*), Cuernavaca (*U.S. Nat. Mus.*), Temax in N. Yucatan (*Gaumer*); GUATEMALA, Cerro Zunil, Calderas, Capetillo, San Gerónimo, Sabo (*Champion*); SALVADOR (*U.S. Nat. Mus.*).

We have received numerous specimens of this species, agreeing with the type communicated by Dr. Sjöstedt. A rhomboid-ovate, rugosely punctate form, with rather close, decumbent, hair-like, brownish vestiture, the elytra sometimes with a few whitish, setiform scales on the disc towards the apex, the punctures on the prothorax coarse, rounded, and separate one from another, the elytral striæ and interstices coarsely punctate, the tibiæ strongly unguiculate in both sexes.

52. *Geræus basinotatus*, sp. n. (Tab. XV. figg. 24, 24 a, ♂.)

Subrhomboidal, shining, black; the prothorax with a few transversely-arranged, long, narrow, white scales; the elytra with a dense, oblong, subtriangular patch of coarse white or ochreous scales on each side of the scutellum at the base, and a line of narrow fuscous scales, intermixed with larger white ones, down each interstice; the under surface thickly clothed with coarse white or pale ochreous scales, the vestiture of the legs finer and wholly white. Head finely punctate, transversely grooved between the eyes; rostrum stout, strongly arcuate, a little shorter than the elytra, broadly sulcate at the sides in its basal half, and somewhat coarsely punctate, in the ♀ much smoother, more tapering, and abruptly bent inward from near the base, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, constricted and much narrowed in front, the sides arcuately converging from the base; very coarsely, densely punctate, except along the smooth median line. Elytra subtriangular, depressed along the suture; deeply punctate-striate, the interstices roughly asperato-punctate. Beneath densely punctate, except along the middle of the ventral segments 3 and 4.

♂. Prosternum armed with two short spines, and with a deep median sulcus; first ventral segment broadly depressed down the middle.

Length $3\frac{1}{2}$ –4, breadth $1\frac{3}{4}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo (*Höge*, *H. H. Smith*), Amula (*H. H. Smith*).

Two males and one female, all from the mountains of Guerrero. This is the only Mexican species known to me with a dense subtriangular patch of coarse white or ochreous scales on the inner part of each elytron at the base. Compared with the allied *G. pugnax*, the prothorax is more coarsely punctured and the elytral interstices are rougher. The rostrum is broadly and shallowly sulcate at the sides towards the base (appearing compressed), and abruptly bowed inwards and tapering in the female.

53. *Geræus submaculatus*, sp. n. (Tab. XV. figg. 25, 25 a, ♂.)

Elliptic, rather convex, shining, black, the rostrum in great part, the antennæ, and legs more or less ferruginous or reddish; rather sparsely clothed with narrow whitish and fuscous scales—the whitish scales on the prothorax condensed into a short streak along the middle at the base and a curved submarginal band, and those on the elytra into a triangular scutellar patch and a transverse patch on the disc a little beyond the middle,—which are transversely arranged on the prothorax and clustered into two rows along each elytral interstice; the vestiture of the under surface closer and wholly whitish. Head finely punctate, transversely depressed between the eyes; mandibles more or less toothed at the base beneath; rostrum a little longer than the head and prothorax, abruptly curved downwards from near the base, the basal portion closely punctate at the sides and much thickened, the other portion almost smooth, the antennæ inserted at (♂) or slightly behind (♀) the middle, the antennal club ovate. Prothorax transverse, rounded at the sides anteriorly, constricted and much narrowed in front; closely punctate, except along a narrow smooth median space. Elytra subtriangular; narrowly punctate-striate, the interstices somewhat roughly punctate. Beneath closely punctate. Tibiæ strongly unguiculate. ♂. Prosternum armed with two short, slender, porrect spines, and slightly depressed down the middle. Length $2\frac{2}{3}$ –4, breadth $1\frac{1}{3}$ – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Temax in N. Yucatan (*Gaumer*); GUATEMALA, San Gerónimo (*Champion*).

Sent us in abundance from Yucatan. A pair only obtained in Guatemala. This species varies greatly in the colour of the vestiture of the upper surface, according to the predominance of the fuscous or the whitish scales on the elytra, but the markings are always visible. The legs are constantly reddish. The prosternal spines are short, slender, and porrect; the rostrum is much thickened at the base; and the mandibles are hollowed on their lower outer edge.

54. *Geræus furcifer*, sp. n. (Tab. XV. fig. 26, ♂.)

Subrhomboidal, narrow, nigro-piceous, the antennæ and legs fusco-ferruginous; clothed with small, scattered, narrow, setiform, intermixed whitish and ochreous scales, those on the elytra arranged in a single series down each interstice; the vestiture of the under surface closer and wholly whitish. Head closely punctate, obsolete foveate between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, moderately stout throughout, striato-punctate, smoother in the ♀, the antennæ inserted a little beyond the middle in both sexes, the antennal club ovate. Prothorax short, gradually and arcuately narrowing from the base, constricted in front; densely, confluent punctate, and with indications of a raised median line. Elytra subtriangular, shining, sharply punctate-striate, the interstices flat and irregularly uniseriate-punctate. Beneath closely punctate. Anterior coxæ narrowly separated. ♂. Prosternum armed with two broad, flattened, bifurcate processes (the upper lobe long and arcuate, the lower one obtuse), and with a very deep excavation between them; first ventral segment deeply excavate, and the fifth slightly depressed, in the middle; anterior tibiæ strongly unguiculate. ♀. Prosternum simply sulcate. Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{3}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Calderas, on the slope of the Volcan de Fuego, 7000 feet (*Champion*).

Two males and five females, all more or less abraded. The lamelliform, bifurcate prosternal processes readily distinguish *G. furcifer* from all its allies. A female from Guatemala city may also belong to it.

55. *Geræus pexus*. (Tab. XV. figg. 27, 27 *a*, ♂.)

♀. *Centrinus pexus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 209¹.

♂. Prosternum armed with two stout, upturned, short or moderately long, connate, granulate spines. Rostrum multicarinate to the tip, the compressed basal portion rugosely punctate as in the ♀. First ventral segment flattened down the middle.

Hab. MEXICO¹ (*Mus. Brit.*), Tonila in Colima (*Höge*); GUATEMALA, Aceytuno (*Salvin*), San Gerónimo and Sinanja in Vera Paz (*Champion*); NICARAGUA, Managua (*Solari*).

I have seen ten specimens of this species, including the (♀) type. The densely squamose surface, the comparatively stout, strongly arcuate, compressed, rugose, carinate rostrum, and the completely connate prosternal spines of the male (which, at most, are less than half the length of the rostrum), readily distinguish *G. pexus*. The prosternum is shallowly sulcate down the middle. The antennal club is ovate and rather small. The mandibles are toothed on the under side at the base externally.

56. *Geræus unicornis*, sp. n. (Tab. XV. figg. 28, 28 *a*, ♂.)

Rhomboidal, narrow, shining, nigro-piceous, the antennæ, rostrum, and legs (and in one specimen the prosternal spine also) more or less ferruginous; somewhat thickly clothed with small whitish and pale brown scales, which are clustered into one, two, or three lines along each elytral interstice, the whitish scales condensed into three narrow vittæ on the prothorax, a streak down the basal half of the interstices 2 and 6, another on 4 beyond the middle, and a shorter one at the apex of 2; the vestiture of the under surface wholly whitish. Head closely punctate; rostrum strongly arcuate, considerably longer than the head and prothorax, slender, slightly thickened at the base and flattened at the tip, finely striate-punctate in its basal half, smoother in the ♀, the antennæ inserted at the middle, the antennal club oblong-ovate. Prothorax transverse, conical, constricted in front; finely, confluent punctate, the narrow interspaces raised into longitudinal rugæ. Elytra triangular, sharply striate, the interstices flat and closely punctulate. Beneath closely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ separated by less than half their own width. Legs rather long and slender.

♂. Prosternum armed with a long porrect spine; first ventral segment slightly depressed down the middle. Length 3-3½, breadth 1½-1½ millim. (♂ ♀.)

Hab. GUATEMALA, Purula (*Champion*) and Coban (*Conradt*) in Alta Vera Paz.

A pair, worn, from Purula, and a male, in fresh condition, from Coban. The slender prosternal spines in this species are completely fused, as in *G. pexus* (Boh.), though the two insects are not otherwise very nearly related. The conical, trivittate prothorax and the interruptedly albo-lineate elytra are also characteristic.

57. *Geræus tuberculifer*, sp. n. (Tab. XV. figg. 29, 29 *a*, ♂.)

Rhomboidal, narrow, black, the antennæ, apical half of the rostrum, tibiæ, and tarsi more or less ferruginous, the femora also sometimes reddish; densely clothed with brown and whitish scales (those on the elytra rather broad), the latter in great part condensed into a median vitta on the prothorax, which extends backward over the scutellum to about the median third of the suture, and a large apical patch on the elytra; the under surface densely albo-squamose. Head densely punctate; rostrum arcuate, stout, becoming more slender towards the tip, distinctly longer than the head and prothorax, closely punctate, the apical half in the ♀ flattened and much smoother, the antennæ in the ♂ inserted at a little beyond, and in the ♀ slightly behind, the middle, the antennal club ovate. Prothorax transverse, conical, feebly constricted in front; densely, finely punctate, with an abbreviated smooth median line. Elytra rather

long, triangular, flattened and transversely depressed on the anterior part of the disc, the subapical callosities prominent; finely punctate-striate, the interstices densely punctulate. Beneath densely punctate; first ventral segment broadly depressed down the middle in the ♂. Prosternum in both sexes shallowly sulcate, the sulcus limited on each side anteriorly by a compressed tubercle. Anterior coxæ narrowly separated. Legs rather slender; anterior tibiæ in the ♂ strongly, and in the ♀ feebly, unguiculate.

Length $3\frac{1}{4}$ – $3\frac{3}{4}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. GUATEMALA, Calderas 7000 feet, on the slope of the Volcan de Fuego (*Champion*).

Three males and one female, two of them in bad condition. Not unlike the Mexican *G. bifurcatus*, but with the vestiture of the elytra differently coloured, the scales on the short white sutural stripe imbricate, the densely squamose prosternum shallowly sulcate and bituberculate just behind the apical constriction. The tubercles are placed further from the anterior coxæ than in the males of the other Centrinides with tuberculate or spined prosternum, and are present in both sexes.

58. *Geræus puncticollis*. (Tab. XV. figg. 30, 30 a, ♂.)

♂. *Centrinus puncticollis*, Boh. in Schönh. Gen. Curc. viii. 1, p. 200¹.

♂. Broad-ovate, robust, black, almost glabrous above and sparsely albo-squamose beneath. Head closely punctate; rostrum stout, arcuate, of equal thickness throughout, about as long as the head and prothorax, coarsely, closely punctate, and clothed with several bristly hairs at the tip beneath, the antennæ inserted behind the middle; mandibles toothed at the base beneath, straight on their inner edge. Prothorax transversely convex, strongly rounded at the sides, narrow and abruptly tubulate in front, deeply sinuate at the base; coarsely, closely punctate, except along the smooth median line. Scutellum smooth, concave. Elytra broad, subtriangular, comparatively short, transversely depressed below the base and beyond the middle, and flattened along the suture; sharply striate, the interstices somewhat closely punctate. Prosternum narrowly and shallowly sulcate anteriorly, slightly tumid in front of each anterior coxa, the intervening space flattened. Anterior coxæ separated by a little more than their own width. Legs short and stout, rugosely punctured. Tibiæ widened at the apex externally, the anterior pair closely ciliate within. Tarsi with joint 2 transverse, the claws free.

Length $5\frac{1}{2}$, breadth 3 millim.

Hab. MEXICO, Alvarado in Vera Cruz (*coll. Chevrolat*¹).

The unique type of this aberrant species has been communicated by Dr. Sjöstedt. The feeble prosternal prominences are due to the intervening space being broadly flattened.

59. *Geræus scutatus*, sp. n. (Tab. XV. figg. 31, 31 a, ♂.)

Oblong-subrhomboidal, rather narrow, shining, black; the upper surface with scattered, narrow, white scales along each elytral interstice and at the sides of the prothorax, the scutellum with a dense transverse patch of similar scales; the under surface and legs somewhat thickly albo-squamose. Head closely punctate; rostrum strongly arcuate, about as long as the head and prothorax, rather stout, thickened towards the base, coarsely striate-punctate in the ♂, flattened towards the tip and minutely punctate from near the base in the ♀, the antennæ inserted slightly behind (♀) or a little beyond (♂) the middle, joints 4–7 of the funiculus strongly transverse in the ♂, the club elongated and nearly as long as the funiculus in the ♂, ovate in the ♀. Prothorax broader than long, constricted and much narrowed in front, the sides rounded anteriorly; closely, coarsely punctate, except along a narrow,

smooth, median space. Scutellum transverse. Elytra gradually narrowing from the base, depressed along the suture, the humeri rather prominent; deeply punctate-striate, the interstices asperate-punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. First ventral segment flattened down the middle in the ♂. Tibiæ unguiculate in the ♂, obsolete so in the ♀.

Length $3-4\frac{3}{4}$, breadth $1\frac{1}{2}-2\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Oaxaca (*Höge*), Chiapas (*Sallé*); GUATEMALA, Zapote, Calderas, Dueñas, Purula (*Champion*).

Found in numbers on the slope of the Volcan de Fuego, at Calderas, females preponderating, the single specimen of this sex from Zapote being smaller and less elongate than the others. The transverse cluster of pure white scales on the scutellum, the line of scattered similar scales along each elytral interstice (often in part abraded), the shining surface, depressed elytral suture, and the elongated antennal club of the male, distinguish *G. scutatus*. The present species is very like *Odontocorynus creperus*.

60. *Geræus aspersus*, sp. n. (Tab. XV. figg. 32, 32 a, ♂.)

Subelliptic, shining, black, the antennæ fusco-ferruginous; the sides, hind angles, and median lobe of the prothorax, and the elytral interstices, with scattered pure white scales, the scutellum with a dense oblong cluster of similar scales; the under surface thickly albo-squamose, the vestiture of the legs finer and also white. Head closely punctate, foveate between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, rather stout, striate-punctate, the antennæ inserted at the middle, the antennal club elongate, as long as or a little longer than the funiculus. Prothorax broader than long, rounded at the sides anteriorly, constricted and much narrowed in front; closely, coarsely punctate (the punctures separate one from another), except along the smooth median line. Scutellum subquadrate. Elytra subtriangular, depressed along the suture, blunt at the tip; deeply punctate-striate, the interstices roughly asperate-punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove, unarmed. First ventral segment unimpressed.

Length 3-4, breadth $1\frac{1}{2}-2\frac{1}{10}$ millim. (♂.)

Hab. MEXICO (*coll. Solari*), Toxpam and San Andres Tuxtla in Vera Cruz (*Sallé*).

Four males. Very like *G. scutatus*, but with the general outline more elliptic, due to the prothorax and elytra being a little more rounded at the sides and the humeri less prominent.

61. *Geræus longiclava*, sp. n. (Tab. XV. figg. 33, 33 a, ♂.)

Subrhomboidal, nigro-piceous, the rostrum, antennæ, and legs obscure ferruginous; the prothorax (except along the two bare spaces on the disc) and the base of each elytral interstice clothed with long, narrow, ochraceous scales, those on the prothorax transversely arranged, the prothorax also with a whitish median line, which is continued on to the scutellum and along the suture of the elytra, the rest of the elytral interstices each with two lines of narrow blackish-brown scales; the vestiture of the under surface rather coarse, dense, and whitish, that of the legs also white. Head finely punctate, foveate between the eyes; rostrum arcuate, nearly as long as the elytra, thickened towards the base, striate and sparsely, finely punctate, the antennæ inserted at a little behind the middle, joints 3-7 of the funiculus strongly transverse and closely articulated, the club nearly twice as long as the funiculus, its joint 2 much longer than 1. Prothorax transverse, gradually narrowing from the base, narrowed and constricted in

front; densely punctate. Elytra subtriangular, punctate-striate, the interstices closely asperato-punctate. Beneath densely punctate. Prosternum slightly depressed down the middle. Anterior tibiæ feebly unguiculate.

Length 3, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

Two specimens. The greatly elongated, distinctly articulated antennal club (with long second joint), the short, closely-articulated funiculus, the broadly trivittate prothorax, and the albo-squamose scutellum and suture chiefly distinguish *G. longiclava*. This species and the following one are related to *G. scutatus* and *G. aspersus*.

62. *Geræus tenuiclava*, sp. n. (Tab. XV. figg. 34, 34a, ♂.)

Subrhomboidal, nigro-piceous or black, the legs, rostrum, and antennæ fusco-ferruginous; the prothorax with one or three lines of transversely-arranged, narrow, ochraceous or whitish scales, the median line extending on to the scutellum and sometimes reaching the middle of the suture, the third, fifth, and other interstices often with a short line of similar scales at the base, and the suture with a few others at the tip, the rest of the elytral interstices each with two lines of narrow blackish-brown scales; the vestiture of the under surface rather coarse, dense, and yellowish-white. Head finely punctate, foveate between the eyes; rostrum arcuate, nearly as long as the elytra, striate and finely punctate, the antennæ inserted at about the middle, the antennal club distinctly articulated and nearly as long as the funiculus, joints 3-7 of the latter transverse. Prothorax densely punctate. Elytra subtriangular, deeply striate, the interstices closely asperato-punctate. Prosternum slightly depressed down the middle, with a smooth transverse fovea in front, and the transverse subapical groove deeply impressed on each side behind the eyes. First ventral segment shallowly sulcate. Anterior tibiæ strongly unguiculate.

Length $3\frac{1}{5}$ - $3\frac{3}{4}$, breadth $1\frac{3}{8}$ - $1\frac{9}{10}$ millim. (♂.)

Hab. GUATEMALA, Cahabon, Chiacam, Sinanja (*Champion*), Coban (*Conradt*).

Five males, all from Alta Vera Paz. The less elongate antennal club (with shorter second joint), the longer funiculus, the narrowly vittate prothorax, the transversely foveate prosternum, and the sharply unguiculate tibiæ separate *G. tenuiclava* from *G. longiclava*, which it otherwise closely resembles. In some specimens the scutellum and a median line on the prothorax are whitish, and the rest of the vestiture of the upper surface is blackish-brown.

63. *Geræus albiventris*, sp. n.

Oblong-subrhomboidal, black, the antennæ and anterior tarsi sometimes ferruginous at the base; above sparsely clothed with small, narrow, whitish or yellowish-white scales, which on the elytra are arranged in a single or double row down each interstice, the median lobe of the prothorax and the scutellum sometimes with a patch of scales, the under surface densely clothed with larger pure white scales. Head closely punctate; rostrum arcuate, about as long as the head and prothorax, stout, coarsely punctate and finely carinate, much smoother in the ♀, the antennæ inserted at (♀) or a little beyond (♂) the middle, the antennal club stout and acuminate-ovate in the ♂, smaller and ovate in the ♀. Prothorax transverse, more or less constricted in front, the sides slightly rounded from near the base; rather coarsely, confluent punctate. Elytra subtriangular, separately rounded at the apex, leaving the apex of the last dorsal segment exposed; narrowly striate, the interstices asperato-punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior tibiæ feebly unguiculate, and joints 2 and 3 of the anterior tarsi more or less dilated, in the ♂.

Length $3\frac{1}{2}$ -4, breadth $1\frac{7}{8}$ -2 millim. (♂ ♀.)

Hab. GUATEMALA, Capetillo and Calderas on the slopes of the Volcan de Fuego (*Champion*).

Three males and one female, two of them with the vestiture (?abraded) almost wanting on the scutellum. This insect is not unlike the N.-American *Centrinus scutellum-album*, Say, and *C. salebrosus*, Casey, and the Mexican *C. larvatus*, Boh. (here referred to *Odontocorynus*), but it differs from all of them in the sparse, fine vestiture of the upper surface (a character also separating *G. albiventris* from *G. tectus*), the under surface being densely clothed with rather large white scales; the male, moreover, has the anterior tarsi dilated and the antennal club simply acuminate. The tip of the last dorsal segment is exposed, owing to the elytra being separately rounded at the apex.

64. *Geræus tectus*, sp. n. (Tab. XVI. figg. 1, 1 a, ♀.)

Subrhomboidal, broad, flattened above, black, the tarsi obscure ferruginous; densely albo-squamose beneath, the upper surface (the base of the rostrum included) thickly clothed with rather coarse, narrow, yellowish-white scales, the scales on the prothorax long and transversely arranged, condensed into a small patch in front of the scutellum, those on the elytra arranged in a close double or treble series down each interstice, the first with one row only beyond the middle. Head closely punctate; rostrum curved downward from the base, a little longer than the head and prothorax, rather stout, the basal portion thickly punctate and finely carinate, the apical two-thirds much smoother, the antennæ inserted at the middle, the antennal club short-ovate, stout. Prothorax transverse, rounded at the sides from near the base, much narrowed and feebly constricted in front; densely, rugulosely punctate. Scutellum depressed, transverse, almost bare. Elytra subtriangular, separately rounded at the tip, leaving the apex of the last dorsal segment exposed; narrowly punctate-striate, the interstices densely asperato-punctate. Beneath densely, finely punctate, the sculpture hidden by the broad scales. Prosternum slightly depressed down the middle. Anterior coxæ separated by about half their own width.

Length $4\frac{3}{4}$, breadth $2\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Oaxaca (*Höge*).

One female. Very like *Odontocorynus larvatus* (Boh.) (♀), but with the scales on the upper surface much longer and less crowded, and condensed into a small, transverse, projecting patch on the median lobe of the prothorax (instead of on the scutellum), the prothorax without trace of a smooth median space, the rostrum less curved. The vestiture of the upper surface is longer and much coarser than in the N.-American *C. (Odontocorynus) scutellum-album*, Say*, and *C. salebrosus*, Casey, and the scutellum wants the white patch.

65. *Geræus viridicans*, sp. n. (Tab. XVI. figg. 2, 2 a, b, ♂.)

Rhomboidal, narrow, shining, greenish-æneous, the antennæ fusco-ferruginous, the tip of the rostrum and the legs ferruginous; rather sparsely clothed with small, narrow, ochreous and whitish scales, which are arranged in a single or double line down each elytral interstice, the vestiture of the under surface close and whitish. Head finely punctate, transversely grooved between the eyes; rostrum rather stout, arcuate, longer than the head and prothorax, sparsely punctate, the antennæ (fig. 2 b) inserted at about

* Also recorded from Brazil by Casey, but we have not received it from within our limits.

the middle, the antennal club large, short-ovate, the sutures very distinct. Prothorax transverse, narrow, conical, strongly constricted in front; densely, finely punctate, the narrow interspaces longitudinally raised. Elytra rather long, subtriangular, transversely depressed on the disc below the base; finely and sharply punctate-striate, the interstices irregularly uniseriate-punctate. Beneath closely, finely punctate; first ventral segment depressed down the middle. Prosternum unimpressed behind the deep transverse subapical groove. Anterior coxæ narrowly separated. Legs rather long and slender, the tibiæ narrow and with the apical uncus slender.

Length $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

One male. A small narrow form, with greenish-æneous elytra, a large, somewhat rounded antennal club, and slender ferruginous legs, the elytral vestiture fine and arranged in a single line (which is doubled here and there) along each interstice.

66. *Geræus scitus*, sp. n. (*G. scitulus*, Tab. XVI. figg. 3, 3 a, ♀.)

Oblong-rhomboidal, shining, æneous, the legs, antennæ, and tip of the rostrum ferruginous; somewhat thickly clothed with intermixed narrow ochreous and coarser white scales, which are arranged in about two rows down each elytral interstice; the vestiture of the under surface wholly white, that of the legs fine and hair-like. Head finely punctate, transversely grooved between the eyes; rostrum strongly arcuate at the base, a little longer than the head and prothorax, moderately stout, flattened at the tip, sparsely, finely punctate, the antennæ inserted behind the middle, the outer joints of the funiculus narrow and transverse, the club stout, short-ovate. Prothorax subconical, transverse, strongly constricted in front; longitudinally wrinkled and finely punctate. Elytra subtriangular, rather long, depressed along the suture at the base; finely and sharply punctate-striate, the interstices sparsely punctate. Beneath closely punctate. Prosternum transversely excavate anteriorly. Legs rather long and slender; tibiæ feebly unguiculate.

Length $3\frac{1}{2}$, breadth $1\frac{2}{3}$ millim. (♀.)

Hab. MEXICO, Chilpancingo in Guerrero (*H. H. Smith*).

One specimen. Closely related to *G. viridicans*, and perhaps the female of that species, but differing from it in the coarser vestiture of the upper surface. The elytra with numerous intermixed larger white scales, the prothoracic rugæ more conspicuous. The mandibles are hollowed at the sides beneath. The sutures of the antennal club are conspicuous.

67. *Geræus orichalceus*, sp. n.

Rhomboidal, narrow, shining, æneous, the antennæ in part, the apical half of the rostrum, and the legs ferruginous; above sparsely clothed with hair-like, ochreous scales, intermixed on the elytra with a few white ones, the elytral vestiture arranged in a single line down each interstice, that of the under surface closer and wholly white. Head finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, moderately stout, considerably longer than the head and prothorax, finely punctate in its basal half, the antennæ inserted at the middle, the antennal club ovate and rather large. Prothorax short, conical, constricted in front; finely punctate, the narrow interspaces longitudinally raised. Scutellum smooth. Elytra subtriangular, sharply striate, the interstices finely and irregularly uniseriate-punctate. Beneath densely punctate. Prosternum longitudinally sulcate anteriorly, narrowly raised between the coxæ. Legs rather long and slender.

Length $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♀?)

Hab. COSTA RICA, Irazu (*Rogers*).

One specimen. Near *G. scitus* and *G. viridicans*, the prothorax shorter, less constricted in front, and with the raised lines on the disc less crowded, the antennal club smaller, the prosternum longitudinally sulcate anteriorly; the vestiture is long and hair-like on the prothorax and uniseriately arranged on the elytra.

68. *Geræus subæratu*s, sp. n.

Rhomboidal, rather narrow, black, with a slight brassy lustre; somewhat thickly clothed with small, narrow, brownish-white scales, which are arranged in about two rows down each elytral interstice; the vestiture of the under surface and legs whitish. Head finely punctate, transversely grooved between the eyes; rostrum abruptly bowed from the base, moderately stout, reaching the apex of the metasternum in the ♀, closely punctate-striate in the ♂, much smoother in the ♀, the antennæ inserted at or near the middle, the antennal club stout, oblong-ovate. Prothorax transverse, arcuately narrowing from the base, strongly constricted in front; densely, finely, confluent punctate, the narrow interstices rugiform. Elytra subtriangular, rather convex, sharply punctate-striate, the interstices densely rugulose. Beneath densely punctate; first ventral segment deeply excavate down the middle in the ♂. Prosternum sulcate anteriorly. Anterior tibiæ strongly, in the ♀ more feebly, unguiculate, somewhat widened at the apex in the ♂.

Length $3\frac{1}{8}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. GUATEMALA, Calderas on the slope of the Volcan de Fuego 7000 feet (*Champion*).

Two specimens, both in worn condition. Near the Mexican *G. scitus*, but with the elytra more rugose and rapidly narrowed from the base, the vestiture finer, the legs and antennæ infusate, the antennal club more elongate and with longer basal joint, the prosternum (as in *G. orichalceus*) sulcate anteriorly. The unarmed prosternum in the male, the much longer rostrum, the longer antennal club, &c., separate *G. subæratu*s from *G. furcifer*.

69. *Geræus bifurcatus*, sp. n. (Tab. XVI. figg. 4, 4 a, ♀.)

Subrhomboidal, rather narrow, piecous, the apical half of the rostrum, antennæ, tibiæ, and tarsi more or less ferruginous; densely clothed with narrow whitish and ochreous scales, which are clustered on the elytra into three or four close series down each interstice, the prothorax with two partially denuded longitudinal spaces on the disc, the elytra each with a sharply-defined, transverse, oblique, interiorly bifurcate, blackish-brown fascia at about the middle of the disc; the vestiture of the under surface and legs rather sparse and fine, closer on the front of the prosternum. Head finely punctate; rostrum strongly arcuate, slightly longer than the head and prothorax, thickened, punctured, and squamose at the base, the outer half flattened and almost smooth, the antennæ inserted at a little behind the middle, the club stout and ovate. Prothorax transverse, narrowing from the base, constricted in front, densely, finely punctate. Scutellum small, transverse, almost bare. Elytra subtriangular, rather long, flattened on the disc at the base, and with prominent subapical callosities; finely punctate-striate, the interstices densely punctulate. Beneath closely punctate, the sides of the metasternum smoother. Prosternum slightly hollowed down the middle. Anterior coxæ narrowly separated.

Length $3\frac{4}{5}$, breadth $1\frac{3}{4}$ millim. (♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*).

One specimen, in very fresh condition. Closely related to *G. tuberculifer*, but with a large, oblique, bifurcate, sharply-defined, dark patch on the disc of each elytron, the

rostrum more curved, the vestiture of the under surface sparser and finer, the prosternum without trace of prominences. The vestiture of the rest of the upper surface is whitish, shading off into ochreous in places, and that of the elytra is coarse.

70. *Geræus decemlineatus*, sp. n. (Tab. XVI. figg. 5, 5 *a*, *b*, ♂.)

Oblong-rhomboidal, shining, black (the legs ferruginous in one immature specimen); the prothorax with a median vitta and a space along the sides, the scutellum, the alternate elytral interstices, and the entire under surface, thickly clothed with white scales, the rest of the vestiture of the upper surface sparse, blackish-brown, that of the rostrum and legs white. Head finely punctate; rostrum arcuate, longer than the head and prothorax, thickened towards the base, closely punctate and feebly carinate,—the apical portion in the ♀ more slender, longer, smoother, and flattened,—the antennæ inserted at (♀) or beyond (♂) the middle, the antennal club oblong-ovate. Prothorax short, conical, feebly constricted in front; densely, finely punctate. Scutellum squamose. Elytra much wider than the prothorax, long, narrowing from the base; deeply punctate-striate, the interstices rugulosely punctate. Beneath densely, finely punctate; ventral segments 1 and 2 slightly depressed down the middle. Prosternum unimpressed. Anterior coxæ narrowly separated. Legs rather long and slender.

♂. Anterior tibiæ curved, strongly unguiculate, hollowed on the inner side from about the basal third to near the tip.

Length $3\frac{3}{5}$ – $4\frac{1}{2}$, breadth $1\frac{1}{5}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

Three males and one female. This is one of many interesting new forms found by Mr. Smith at Omilteme. It is readily distinguishable by its long, albo-lineate elytra, short, conical, trivittate prothorax, &c.

71. *Geræus omiltemæ*, sp. n. (Tab. XVI. figg. 6, 6 *a*, ♀.)

Elongate-rhomboidal, flattened above, black, the tarsi ferruginous at the base; thickly clothed with small scales, which are whitish on the median lobe of the prothorax, on the scutellum, along the suture, and on the fifth elytral interstice posteriorly, and brown on the rest of the upper surface; the under surface albo-squamose. Head closely punctate; rostrum stout, arcuate, slightly longer than the head and prothorax, sparsely, finely punctate, the antennæ inserted at a little beyond the middle, the outer joints of the funiculus strongly transverse, the club short and stout. Prothorax transverse, rounded at the sides, narrowed and feebly constricted in front; densely, finely punctate. Scutellum rather large, densely squamose. Elytra considerably wider than the prothorax, elongate-triangular; finely punctate-striate, the interstices flat and densely, rugulosely punctate. Beneath densely punctate. Prosternum shallowly but sharply sulcate anteriorly, the sulcus limited on each side by a short straight ridge. Anterior coxæ separated by about half their width. Metathoracic episterna very broad. Legs moderately long; tibiæ each with a slender uncus at the tip.

Length 4, breadth $1\frac{5}{8}$ millim. (♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

One specimen. Very like *Pseudogeræus macropterus*, but more flattened above, the mandibles straight on their inner edge, the prosternum sulcate anteriorly, the metathoracic episterna much broader, the scutellum larger, the elytral interstices densely rugulose, the sinuous interspaces on the prothorax not longitudinally confluent. The antennal club is short.

72. *Geræus ciliatipes*, sp. n. (Tab. XVI. figg. 7, 7 a, ♂.)

Subrhomboidal, narrow, flattened above, black, shining; thickly clothed with very small, narrow, brown and whitish scales, the whitish scales on the prothorax mainly condensed into three vittæ and those on the elytra into a faint line along the first (sutural), fifth, and seventh interstices; the vestiture of the under surface rather dense and white. Head finely punctate; rostrum arcuate, slightly longer than the head and prothorax, rather slender, finely punctate, the apical portion flattened and smoother, clothed with a few hairs at the tip beneath, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax transverse, narrowing from the base, constricted in front; densely, finely punctate, except along the smooth abbreviated median line. Elytra oblong-subtriangular; narrowly and sharply punctate-striate, the interstices densely punctulate. Beneath densely, finely punctate; ventral segments 1 and 2 broadly flattened down the middle. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ narrowly separated. Femora beneath, and the tibiæ within, clothed with fine hairs, those on the hind tibiæ long and conspicuous; all the tibiæ somewhat strongly unguiculate.

Length 3-3½, breadth 1½-1½ millim. (♂.)

Hab. GUATEMALA, Calderas 7000 feet (*Champion*).

Two males. The long fine hairs on the legs are doubtless peculiar to this sex: they are easily abraded and are almost wanting on the hind tibiæ in one of the two specimens described. Smaller, less oblong, and more shining than *G. omiltemæ*, the scutellum smaller and less densely squamose, the prosternum not sulcate.

73. *Geræus dugesi*, sp. n. (Tab. XVI. figg. 8, 8 a, ♂.)

Oblong-rhomboidal, flattened above, nigro-piceous; thickly clothed with narrow ochraceous scales, the prothorax with two abbreviated vittæ on the disc and a streak on the flanks, and the elytra with a vitta along the disc near the suture and another at the sides, blackish-brown, these markings obliterated in one specimen, the scales on the prothorax transversely arranged and those on the elytra clustered into three rows down each interstice; the vestiture of the legs and under surface dense, yellowish-white. Head finely punctate; rostrum a little longer than the head and prothorax, arcuate, slender, thickened at the base, finely punctate, except along the middle, the antennæ inserted at about midway, the antennal club ovate. Prothorax slightly broader than long, narrowing from the base, feebly constricted in front; densely, finely punctate. Elytra subtriangular, rather long, narrowly punctate-striate, the interstices densely punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. First ventral segment flattened down the middle. Anterior coxæ well-separated.

Length 4-4½, breadth 1½-2½ millim. (♂.)

Hab. MEXICO, Guanajuato (*Sallé*).

Two males—one with the prothorax and elytra nigro-vittate (taken as the type), the other with the vestiture of the upper surface uniformly ochraceous. Narrower and more flattened above than *G. trivittatus*, the prosternum unarmed in the male, the vestiture of the upper surface longer, the scutellum clothed with yellowish-white scales.

74. *Geræus bicruciatu*s, sp. n. (Tab. XVI. figg. 9, 9 a, ♀.)

Elliptic, rather narrow, black; thickly clothed with whitish scales, the prothorax with two broad vittæ on the disc (in one specimen reduced to four spots) and a spot or elongate streak on each side, the scutellum, and the elytra each with a large subquadrate patch on the disc before the middle and a smaller patch towards the apex, these markings usually connected along the sides, fuscous or blackish. Head closely punctate; rostrum strongly arcuate, about as long as the head and prothorax, moderately stout, closely punctate,

much smoother in the ♀, the antennæ inserted at the middle, the antennal club ovate. Prothorax densely, finely punctate, often with indications of a raised median line. Elytra finely punctate-striate, the interstices densely punctate. Beneath densely punctate. Prosternum slightly depressed in the middle in front, unarmed in the ♂. Anterior coxæ separated by fully their own width. Length $2\frac{1}{2}$ – $2\frac{3}{4}$, breadth $1\frac{1}{10}$ – $1\frac{2}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa in Tabasco (*H. H. Smith*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Chiacam in Vera Paz (*Champion*).

Found in numbers at Chiacam. Smaller and narrower than *G. crucifer*, the vestiture not so coarse, the markings equally variable (the prothorax, however, usually with a dark lateral stripe, in addition to the two vittæ on the disc), the rostrum a little more slender, the prosternum unarmed in the male. The present species, like *G. crucifer* and *G. octomaculatus*, appears to be confined to the Atlantic slope.

75. *Geræus lineatulus*, sp. n. (Tab. XVI. figg. 10, 10 a, ♂.)

Oblong-elliptic, piceous, the antennæ (the club excepted), the outer half of the rostrum, and the legs obscure ferruginous; thickly clothed with brown and white scales, the white scales on the prothorax condensed into a sharply-defined, narrow, submarginal vitta on each side and those on the elytra into a long streak down the suture and another on the sixth interstice, a short streak on the fourth interstice beyond the middle and another on the second near the apex, and various spots at the base; the vestiture of the under surface dense and whitish. Head closely punctate; rostrum arcuate, rather longer than the head and prothorax, moderately stout, closely punctured, the antennæ inserted at the middle, the antennal club ovate. Prothorax strongly transverse, arcuately narrowing from the base; densely, finely punctate, with a smooth, faint, incomplete, median line. Scutellum small, almost bare. Elytra narrowing from the base, the humeri rounded; narrowly punctate-striate, the interstices rugulose. Beneath densely punctate, the first ventral segment hollowed and more sparsely punctured down the middle. Prosternum unimpressed behind the shallow transverse subapical groove. Anterior coxæ separated by rather less than half their own width. Anterior tibiæ unguiculate. Tarsal claws small.

Length $2\frac{2}{3}$, breadth $1\frac{1}{3}$ millim. (♂.)

Hab. GUATEMALA, Capetillo (*Champion*).

One specimen, in very fresh condition. In this species the brown vestiture predominates on the upper surface, the white submarginal vittæ on the prothorax are sharply defined, the white lines on the elytra are conspicuous, and the scales along the sutural stripe are imbricate. *Centrinopus alternatus*, Casey, is somewhat similarly marked, but it has the prothorax trivittate, the scutellum densely squamose, the sutural stripe is wanting, &c.

76. *Geræus iners*, sp. n. (Tab. XVI. figg. 11, 11 a, ♂.)

Oblong-ovate, rather convex, shining, black; sparsely clothed with rather coarse, narrow, setiform, yellowish-white scales, which are arranged in an irregular double series down each of the elytral interstices, the vestiture of the under surface whitish. Head sparsely, finely punctate, transversely grooved between the eyes; rostrum arcuate, about as long as the head and prothorax, rather stout, slightly thickened towards the base, sparsely punctate, the antennæ inserted at about the middle, the antennal club short-ovate. Prothorax transverse, constricted and much narrowed in front, the sides rounded from near the base; densely, confluent punctate, the narrow interspaces raised into sinuous longitudinal ridges, the disc with a smooth median ridge. Scutellum small, hollowed behind, almost bare. Elytra moderately long, punctate-sulcate, the interstices convex and sparsely, irregularly biseriato-punctate. Beneath closely punctate; first ventral segment more or less hollowed down the middle. Prosternum excavate

down the middle anteriorly. Anterior coxæ narrowly separated. Tibiæ strongly unguiculate, the anterior and intermediate pairs dilated at the apex.
Length 4-5, breadth $1\frac{2}{3}$ - $2\frac{1}{3}$ millim. (♂.)

Hab. MEXICO, Omilteme, Xucumanatlan and Chilpancingo in Guerrero, 4600-8000 feet (*H. H. Smith*).

Three specimens, apparently all males. An oblong, rather convex form, with a confluent punctate prothorax (except along the smooth median line), convex, shining elytral interstices, and coarse, scattered, setiform vestiture. *G. iners* somewhat resembles *G. coarctatus*, these two species being more elongate than usual in this genus, approaching *Nicentrus*.

• 77. *Geræus tonsilis*. (Tab. XVI. figg. 12, 12 a, b, ♂.)

Centrinus tonsilis, Boh. in Schönh. Gen. Curc. viii. 1, p. 218¹.

Centrinus (*Odontocorynus*) *tonsilis*, Casey, Ann. N. York Acad. Sci. vi. p. 577, nota².

Hab. MEXICO^{1 2} (*Dupont and Truqui*, in *Mus. Brit.*), Toxpam, Orizaba, Parada, Yolos (*Sallé*), Cordova, Jalapa, Oaxaca (*Höge*), Cuernavaca (*U.S. Nat. Mus.*), Chilpancingo (*Höge*, *H. H. Smith*), Amula (*H. H. Smith*), Temax in N. Yucatan (*Gaumer*); COSTA RICA (*Van Patten*).

A common insect in Mexico*. Distinguished by its oblong shape, the rather long, close, uniform, cinereous vestiture of the upper surface (arranged in two or three lines down each elytral interstice), and the unarmed prosternum and simple anterior tibiæ of the male. The rostrum is rather stout, sparsely squamose to the tip in the male, a little smoother and flattened towards the apex in the female. The prosternum is slightly depressed down the middle. The intermediate and posterior tibiæ are dilated at the apex, both strongly unguiculate in the male, the anterior pair with the claw almost obsolete in both sexes. The first ventral segment is excavate down the middle in the male. The mandibles are rather long, hollowed at the sides beneath, and meeting in a straight line above. The antennal club is small and ovate, not in the least modified in the male.

78. *Geræus gaumeri*, sp. n. (Tab. XVI. figg. 13, 13 a, ♂.)

Oblong-rhomboidal, shining, black; above sparsely clothed with narrow, adpressed, setiform, cinereous scales, the scales on the prothorax transversely arranged and those on the elytra condensed into one or two lines down each interstice, the prothorax with a faint vitta of coarser scales (those on the disc being fine and hair-like) on each side near the outer margin and the elytra with the vestiture a little more condensed at the base of the second and third interstices; the under surface somewhat thickly albosquamose. Head finely punctate, shallowly foveate between the eyes; rostrum arcuate, about as long as the head and prothorax, rather stout, slightly thickened towards the base, striate-punctate, smoother at the apex in the ♀, the antennæ inserted at (♀) or a little beyond (♂) the middle, the antennal club ovate. Prothorax broader than long, narrowing from the base, constricted in front; closely, rather coarsely punctate, except along the smooth median line. Elytra subtriangular, narrowly punctate-striate,

* Since these pages have been in type I have seen an allied form with finer vestiture, &c., from Mexico city and Guanajuato, which must be dealt with in the Supplement.

the interstices flat and asperato-punctate, 2-6 with a double, and the others with a single row of scales. Beneath closely punctate. Prosternum without definite impression, unarmed in the ♂. First ventral segment depressed down the middle in the ♂. Anterior coxæ separated by a little less than their own width. Tibiæ somewhat hairy, all sharply unguiculate at the apex in both sexes, the intermediate and posterior pairs widened at the tip.

Length $4-4\frac{1}{2}$, breadth $2-2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Tehuantepec (*U.S. Nat. Mus.*), Campeche in Yucatan (*Leseleuc*), Temax in N. Yucatan (*Gaumer*); NICARAGUA, Chontales (*Janson*).

Sent us in abundance by Mr. Gaumer. A single specimen only (♀) from Nicaragua. Very like *G. tonsilis* (Boh.), a species occurring with it in Yucatan, but with the vestiture sparser and finer above, the prothorax with fine hair-like scales on the disc and a faint submarginal band of coarser scales on each side, the elytral interstices each with one or two lines of setiform scales, the anterior tibiæ strongly unguiculate in the male. The unarmed prosternum, darker legs, immaculate elytra, &c., separate *G. gaumeri* from *G. submaculatus*.

79 *Geræus puellus*, sp. n.

Oblong-elliptic, narrow, shining, nigro-piceous; above somewhat thickly clothed with narrow, yellowish-white scales, which become finer and hair-like on the disc of the prothorax, those on the elytra arranged in two lines down each interstice, 1 with one line only, the vestiture of the under surface closer and coarser. Head finely punctate; rostrum arcuate, a little longer than the head and prothorax, moderately stout, thickened towards the base, closely punctate, the antennæ inserted at about the middle, the funiculus slender, the club ovate. Prothorax transverse, gradually and arcuately narrowing from the base, feebly constricted in front; densely punctate, with indications of a smooth median line. Scutellum small, bare. Elytra oblong-subtriangular, very little wider than the prothorax; finely punctate-striate, the interstices rugulose punctate. Beneath densely punctate; first ventral segment slightly depressed down the middle. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ well separated. Legs rather long; anterior and intermediate tibiæ strongly unguiculate.

Length 3, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, Tepetlapa in Guerrero (*H. H. Smith*).

One male. Smaller than *G. tonsilis*, the vestiture not so close, finer on the disc and somewhat condensed along the sides of the prothorax, and more regularly arranged on the elytra, the anterior and intermediate tibiæ (♂) strongly unguiculate. *G. puellus* has somewhat the facies of *Nicentrus lineicollis*.

80. *Geræus candidus*, sp. n. (Tab. XVI. figg. 14, 14 a, ♂.)

Oblong-rhomboidal, black; densely clothed with oblong pure white or whitish scales, which are clustered into about three or four compact rows down each elytral interstice, the scales on the under surface larger, hiding the sculpture. Head closely punctate; rostrum arcuate, longer than the head and prothorax, stout, tapering towards the tip, closely punctate, that of the ♀ bare and almost smooth from about the basal third, the antennæ inserted at (♂) or behind (♀) the middle, the antennal club stout, ovate. Prothorax transverse, subconical, feebly constricted in front; densely, finely punctate, with indications of a raised median line. Scutellum almost bare. Elytra subtriangular, rather long, flattened on the disc at the base; finely punctate-striate, the interstices densely rugulose punctate. Beneath densely punctate. Prosternum unarmed, hollowed down the middle in the ♂. Anterior tibiæ in the ♂ sinuous within and feebly unguiculate at the apex.

Length $4-4\frac{2}{3}$, breadth $2-2\frac{1}{6}$ millim. (♂ ♀.)

Hab. MEXICO, Guanajuato (*Sallé*: ♂), Omilteme, Chilpancingo (*H. H. Smith*: ♀).

One male and two females, the latter in very fresh condition. Larger and more densely squamose than *G. hospes*, the rostrum less abruptly narrowed (especially in the ♀), the scutellum almost bare, the anterior tibiæ of the male not excised near the tip beneath, the antennal club stouter. The much denser vestiture, the hollowed and distinctly unguiculate anterior tibiæ of the male, &c., separate *G. candidus* from *G. tonsilis*.

81. *Geræus hospes*. (Tab. XVI. figg. 15, 15 *a*, *b*, ♂; 16, ♀.)

♀. *Centrinus hospes*, Casey, Ann. N. York Acad. Sci. vi. pp. 575, 585¹.

Oblong-rhomboidal, black, the antennæ and tarsal claws usually more or less ferruginous; above thickly and uniformly clothed with narrow whitish or brownish-white scales, the under surface with larger and broader white scales. Head finely punctate; rostrum arcuate, longer than the head and prothorax, much thickened in its basal half, squamose and closely punctate,—the apical portion in the ♀ longer, abruptly flattened, almost smooth, and slender,—the antennæ inserted at a little behind the middle in the ♂, and at about the basal third in the ♀, the antennal club ovate. Prothorax transverse, narrowing from the base, feebly constricted in front; densely, finely punctate. Scutellum squamoso. Elytra subtriangular, shallowly punctate-striate, the interstices densely, rugulosely punctate, each with two or three rows of scales. Beneath densely punctate; first ventral segment flattened in the middle in the ♂. Prosternum almost unimpressed. Anterior coxæ separated by a little less than half their own width. Legs moderately long.

♂. Anterior and intermediate tibiæ strongly unguiculate, the anterior pair widened from near the base and abruptly notched beneath just before the tip, the intermediate pair also sinuous; posterior tibiæ hairy on the inner side at the apex.

Length 3–4, breadth $1\frac{1}{2}$ –2 millim. (♂ ♀.)

Hab. NORTH AMERICA, Tucson in Arizona¹.—MEXICO (*Dupont and Truqui*, in *Mus. Brit.*), Chilpancingo (*H. H. Smith*), Yautepec, Irapuato, Iguala, Cordova, Oaxaca (*Höge*), Guanajuato, Toxpan (*Sallé*), San Rafael Jicaltepec (*U.S. Nat. Mus.*); GUATEMALA, San Gerónimo (*Champion*); COSTA RICA, Escazu 1200 metres (*Biolley*), Atenas (*U.S. Nat. Mus.*); PANAMA, Volcan de Chiriqui (*Champion*).

Sent in numbers from Chilpancingo and Escazu; the Costa Rican specimens are labelled as having been found on a species of *Croton*. Smaller and duller than *G. tonsilis*; the rostrum of the female (fig. 16) abruptly narrowed at about the basal third, and quite slender and almost smooth thence to the apex, the antennæ inserted far behind the middle in this sex; the prothorax more transverse; the anterior tibiæ of the male abruptly notched beneath near the apex and strongly unguiculate (fig. 15 *b*). The vestiture is denser in some examples than in others. A male and female from Chilpancingo are figured. *G. hospes* was described from a single female specimen and the identification is perhaps doubtful.

82. *Geræus incolatus*, sp. n.

Rhomboidal, rather narrow, black, shining, the antennæ and tarsi more or less ferruginous; above rather sparsely clothed with narrow yellowish-white scales, which are arranged in two or three rows down each elytral interstice, the vestiture of the under surface coarser, closer, and wholly whitish. Head finely punctate; rostrum strongly arcuate, a little longer than the head and prothorax, stout, tapering towards

the tip, closely punctate,—the apical portion flattened, longer, and almost smooth in the ♀,—the antennæ inserted at (♂) or behind (♀) the middle, the antennal club ovate. Prothorax transverse, subconical, densely, finely punctate, with indications of a smooth median line. Scutellum almost bare. Elytra triangular, narrowly punctate-striate, the interstices rugulose punctate. Beneath densely punctate. Prosternum unarmed. Anterior tibiæ of the ♂ narrow, strongly unguiculate, sinuous within.

Length $3-3\frac{1}{2}$, breadth $1\frac{1}{2}-1\frac{2}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo and Omilteme in Guerrero (*H. H. Smith*).

One male and two females. Very like *G. hospes*, but more sparsely squamose above, the scutellum almost bare, the rostrum less abruptly narrowed (especially in the ♀), shorter in the male, the anterior tibiæ narrow, not excised near the tip beneath in the male, the antennæ and tarsi almost wholly ferruginous.

83. *Geræus rubritarsis*, sp. n.

Rhomboidal, black, the antennæ and tarsi rufo-ferruginous; above sparsely clothed with fine, hair-like, whitish scales, which become a little more crowded at each angle of the prothorax and on the median lobe, those on the elytra arranged in one or two rows down each interstice, the vestiture of the under surface coarser, white, dense on the anterior portion of the prosternum and on the metathoracic episterna. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, moderately stout, sparsely punctate, smoother in the ♀, the antennæ inserted slightly beyond (♂) or behind (♀) the middle, the antennal club ovate. Prothorax transverse, narrowing from the base, constricted in front; densely punctate, with an incomplete smooth median line. Elytra triangular, deeply punctate-striate, the interstices rugulose punctate. Beneath densely punctate; first ventral segment hollowed down the middle in the ♂. Prosternum unarmed, transversely foveate in the subapical groove. Legs rather long and slender; anterior tibiæ strongly unguiculate in the ♂.

Length $2\frac{2}{3}-3\frac{1}{2}$, breadth $1\frac{2}{3}-1\frac{4}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Juquila in Oaxaca (*Sallé*: ♂ ♀); GUATEMALA, Trece Aguas (*U.S. Nat. Mus.*: ♂); PANAMA, Tabernilla, Canal Zone (*Busck*, in *U.S. Nat. Mus.*: ♀).

A pair from Juquila (taken as the types) and one specimen from each of the other localities. Distinguishable amongst its allies with unarmed prosternum by the sparse, fine vestiture of the upper surface, which is somewhat condensed at each angle of the prothorax, the rufescent antennæ and tarsi, &c. *G. rubritarsis* approaches *G. incolatus*, but differs from it in the sparser and finer vestiture, especially of that of the prothorax.

84. *Geræus varius*, sp. n. (Tab. XVI. figg. 17, 17 a, ♀.)

Subrhomboidal, narrow, shining, black, the elytra in one specimen each with a transverse rufous patch on the outer part of the disc before the middle; sparsely clothed (the funiculus included) with setiform, semierect, white scales, which are arranged in a single series along each elytral interstice; the under surface thickly set with larger pure white scales. Head sparsely punctate; rostrum arcuate, longer than the head and prothorax, rather stout, thickly punctate on each side at the base and almost smooth thence to the tip, the antennæ inserted behind the middle, the antennal club stout, short-ovate. Prothorax transverse, rounded at the sides anteriorly, constricted and much narrowed in front; coarsely, confluent punctate. Elytra subtriangular, deeply punctate-striate, the interstices somewhat convex and roughly uniseriate-punctate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Legs moderately long; anterior and intermediate tibiæ unguiculate.

Length $3-3\frac{1}{2}$, breadth $1\frac{1}{2}-1\frac{2}{3}$ millim. (♀.)

Hab. MEXICO, Chilpancingo (*Höge*), Soledad (*H. H. Smith*).

Two females, both from Guerrero, the one from Chilpancingo with a bright rufous

patch on the outer part of the disc of each elytron (fig. 17), the other immaculate. The vestiture of the upper surface is semierect and setiform, and the prothorax is coarsely punctured. The mandibles are very slightly decussate at the tip.

85. *Geræus albosetosus*, sp. n.

Subrhomboidal, narrow, black, shining; above sparsely clothed with setiform white scales intermixed with blackish more or less erect hairs, the white scales on the prothorax condensed along the basal margin or down the middle, the vestiture of the elytra arranged in a single line down each interstice, that of the under surface rather sparse and white, denser on the meso- and metasternal side-pieces. Head finely punctate; rostrum arcuate, about as long as the head and prothorax, thickened towards the base, and somewhat closely punctate—in the ♀ more abruptly bowed at the base, flattened towards the tip, and much smoother,—the antennæ inserted at the middle, the antennal club stout, short-ovate. Prothorax transverse, rounded at the sides anteriorly, strongly constricted in front; rather coarsely, confluent punctate, sometimes with a smooth central line. Elytra subtriangular, deeply punctate-striate, the interstices finely and irregularly uniseriate-punctate. Beneath densely punctate; first ventral segment broadly depressed down the middle in the ♂. Prosternum unimpressed behind the transverse subapical groove.

Length $2\frac{1}{5}$ – $2\frac{1}{2}$, breadth 1 – $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Dupont*, in *Mus. Brit.*), Chilpancingo (*H. H. Smith*), Jalapa (*U.S. Nat. Mus.*); GUATEMALA, near the city (*Salvin*), Capetillo, Dueñas (*Champion*).

Seven specimens, all females but one. Smaller and less rugose than *G. varius*, the antennæ inserted at the middle of the rostrum, the elytral interstices finely uniseriate-punctate. The vestiture is somewhat variable in extent, and the blackish hairs (conspicuous in one of the examples from Guatemala city) are not always present.

86. *Geræus inchoatus*, sp. n.

Ovate, shining, black, the antennæ and tarsi obscure ferruginous; the prothorax with a transverse patch at the anterior and posterior angles, the elytra with a streak on the sutural interstice at the base, the prosternum with a transverse band in front, and the metathoracic episterna, thickly clothed with rather coarse, oblong, white scales, the elytra also with scattered similar scales at the base and on the apical half, the rest of the under surface and the legs with scattered, very small, hair-like, white scales. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, rather slender, thickened towards the base, slightly longer than the head and prothorax, very finely punctate, rugose laterally in its basal half, the antennæ inserted behind the middle, the antennal club ovate. Prothorax short, arcuately narrowing from the base, strongly constricted and tubulate in front, closely punctate, except along the median line. Scutellum subquadrate. Elytra subtriangular, much wider than the prothorax, rather convex; sharply, narrowly striate, the interstices broad, flat, faintly uniseriate-punctate, the punctures becoming more distinct on the apical half. Beneath closely punctate; first ventral segment slightly depressed down the middle in the ♂. Prosternum short, with a narrow shallow median sulcus.

Anterior coxæ narrowly separated. Tibiæ feebly unguiculate in both sexes.

Length $2\frac{1}{10}$ – $2\frac{1}{2}$, breadth $1\frac{1}{8}$ – $1\frac{3}{8}$ millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas (*Champion*), Trece Aguas (*U.S. Nat. Mus.*).

Four specimens. The shining surface, the transverse white patch at each angle of the prothorax, the white streak behind the scutellum, and the scattered white scales at the base and on the apical half of the elytra distinguish *G. inchoatus*. It is less

elongate than *G. x-notatum* (here placed amongst the species with spined prosternum), the rostrum is differently formed, the elytra have narrower striæ and smoother interstices, &c.

87. *Geræus corrugatus*, sp. n.

Subrhomboidal, shining, black, the antennæ, apex of the rostrum, knees, and bases of the tarsi ferruginous; the sides of the prothorax, the under surface, and legs sparsely clothed with minute, hair-like, and the elytral interstices with a few scattered, coarser, setiform, whitish scales, the scutellum albe-squamose. Head densely punctate, unimpressed between the eyes, which are large and rather narrowly separated; rostrum moderately stout, about as long as the head and prothorax, abruptly curved downwards from near the base, striate-punctate, flattened and smoother in its apical half. Prothorax short, small, subconical, strongly constricted in front; longitudinally strigose, the narrow depressed spaces shallowly, confluent punctate. Scutellum small. Elytra much wider than the prothorax, convex, subtriangular, depressed along the suture anteriorly, the humeri somewhat swollen; deeply striate, the striæ feebly punctate, the interstices somewhat convex, each with a scattered irregular row of very fine punctures. Beneath finely punctate. Prosternum deeply sulcate. Anterior coxæ separated by less than half their own width. Legs moderately long.

Length $2\frac{1}{2}$, breadth $1\frac{1}{2}$ millim.

Hab. GUATEMALA, Cerro Zunil 4000 feet (*Champion*).

One specimen, with most of the setiform scales of the elytra abraded. The longitudinally strigose prothorax, the more prominent humeri, the squamose scutellum, the stouter mandibles, and the deeply sulcate prosternum separate *G. corrugatus* from *G. inchoatus*. This insect is also not unlike *Rhianinus carinirostris*.

88. *Geræus capillosus*, sp. n.

Elliptic, flattened above, shining, piceous, the rostrum, antennæ, legs, and abdomen ferruginous, the elytra more or less mottled with reddish-brown; the sides and under surface of the prothorax clothed with long, hair-like, ochreous scales, the elytral interstices each with an interrupted line of similarly-coloured decumbent setæ down each interstice, the rest of the under surface and the legs sparsely set with shorter and finer hair-like scales. Head closely, minutely punctate, transversely depressed between the eyes; rostrum arcuate, a little longer than the head and prothorax, slender, thickened towards the base, finely punctate, the apical portion smoother, the antennæ inserted behind the middle, the anteunal club ovate. Prothorax transverse, somewhat rounded at the sides, constricted and narrowed in front; sparsely, finely punctate, except along the middle. Scutellum subquadrate. Elytra wider than the prothorax, rounded-triangular, the sutural region depressed below the base; narrowly striate, the interstices finely uniseriate-punctate, flat. Beneath rather sparsely punctate; first ventral segment depressed down the middle. Prosternum with a flattened, smoother space down the centre. Anterior coxæ separated by a little more than their own width. Legs rather short; tibiæ feebly unguiculate.

Length $2\frac{1}{2}$ -3, breadth $1\frac{1}{4}$ - $1\frac{1}{2}$ millim. (♂?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens, varying in the length of the rostrum. This insect resembles a Texan insect (♂) sent me by Mr. Wickham as *Centrinus capillatus*, Lec., but it is smoother and flatter, the rostrum is longer and more slender, the vestiture is longer, the anterior tibiæ are feebly unguiculate, &c. The mandibles are slightly decussate at the tip.

89. *Geræus longiusculus*, sp. n.

Oblong-rhomboidal, narrow, black, the elytra shining; above sparsely clothed with fine, narrow, whitish scales, which on the prothorax are condensed into a faint median stripe, and on the elytra are arranged in one or two lines down each interstice; the vestiture of the under surface denser and coarser, white. Head finely punctate; rostrum arcuate, a little longer than the head and prothorax, moderately stout, closely punctate in the ♂, the apical half flattened, much smoother, and bare in the ♀, the antennæ inserted at about the middle, the antennal club ovate and rather long. Prothorax transverse, constricted in front, narrowing almost from the base; densely, finely, confluent punctate. Elytra oblong-triangular, much wider than the prothorax, flattened on the disc anteriorly; sharply punctate-striate, the interstices punctulate. Beneath densely punctate; first ventral segment broadly depressed in the ♂. Prosternum without definite impression. Legs rather slender; tibiæ feebly unguiculate. Length $2\frac{1}{2}$ -3, breadth $1-1\frac{1}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Guanajuato (*Sallé*: ♀), Omilteme in Guerrero (*H. H. Smith*: ♂ ♀).

One male and three females. A small, narrow form, with a dull, densely punctate prothorax and rather long, shining elytra, the vestiture on the latter arranged in great part in a single line down each interstice. The Guanajuato specimen has an indeterminate band of white scales on each side of the prothorax, as well as a faint median line. The elytra in the present species are longer than in the closely allied *G. varipes*.

90. *Geræus varipes*, sp. n.

Subrhomboidal, narrow, shining, black, the antennæ, tarsi, and apices of the tibiæ rufo-testaceous; above sparsely clothed with fine, narrow, ochreous scales, those on the elytra arranged in two lines down each interstice, 1 with one line only, the prothorax with a faint submarginal vitta on each side and a spot on the median lobe at the base white; the vestiture of the under surface and legs whitish, denser and coarser on the sternal side-pieces and on the front of the prosternum. Head finely punctate; rostrum arcuate, a little longer than the head and prothorax, stout and closely punctate laterally at the base, for the rest flattened, more slender, and almost smooth, the antennæ inserted behind the middle, the antennal club ovate. Prothorax short, subconical; densely, confluent punctate. Scutellum small, bare. Elytra subtriangular, flattened on the disc at the base; narrowly punctate-striate, the interstices punctulate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ very narrowly separated. Tibiæ and tarsi slender. Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

One female. Rather less elongate than *G. longiusculus*, the prothorax shorter, the rostrum (♀) abruptly flattened from the basal third, the antennæ, tarsi, and apices of the tibiæ rufo-testaceous, the vestiture of the upper surface differently coloured. The rostrum has a deep transverse impression on the upper side at about the middle, due to some injury.

91. *Geræus pallidicornis*, sp. n.

Oblong-rhomboidal, narrow, nigro-piceous, the antennæ and tarsi rufo-testaceous; above somewhat thickly clothed with coarse, narrow, whitish and ochreous scales, the whitish scales on the prothorax condensed into three interrupted vittæ and the ochreous ones on the elytra into a narrow sutural stripe, the vestiture of the elytra arranged in two lines down each interstice, the first with one line only;

the vestiture of the under surface coarse, close, and white. Head finely punctate; rostrum (♂) a little longer than the head and prothorax, curved, moderately stout, squamose and closely punctate in its basal half, and flattened, bare, and sparsely punctate thence to the tip, (♀) slender, thickened at the base and flattened and almost smooth thence to the apex, the antennæ inserted at (♂) or far behind (♀) the middle. Prothorax short, subconical, densely punctate. Elytra subtriangular, finely punctate-striate, the interstices roughly punctate. Beneath densely punctate; first ventral segment broadly depressed down the middle in the ♂. Prosternum slightly hollowed down the middle in the ♂, flat in the ♀. Femora clothed with long fine hairs beneath in the ♂. Tibiæ in the ♂ strongly, in the ♀ more feebly unguiculate, the anterior pair with a few long hairs in the ♂.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo in Guerrero 4600 feet (*H. II. Smith*).

One pair, the female in very fresh condition. Perhaps an extreme form of *G. varipes*, with the vestiture much coarser above and beneath, and differently coloured on the elytra, the interstices of the latter more rugose. The rostrum of the male is somewhat flattened and bare in its apical half.

92. *Geræus tenuescens*, sp. n.

Oblong-subrhomboidal, narrow, nigro-piceous, the apices of the tibiæ and the mandibles more or less ferruginous; above somewhat thickly clothed with very small, narrow, brown and whitish scales, the brown scales on the prothorax occupying a broad space on each side of the whitish median line and those on the elytra mainly confined to a large common subtriangular patch on the anterior half, the elytral vestiture arranged in a single line down the whole length of the first interstice and in two lines on the others; the vestiture of the under surface close, uniform, and whitish. Head sparsely punctate; rostrum a little longer than the head and prothorax, curved, moderately stout and closely punctate, in the ♀ much smoother and flattened towards the tip, the antennæ inserted at (♂) or slightly behind (♀) the middle, the antennal club ovate. Prothorax short, conical, narrow, constricted in front; densely, finely punctate. Scutellum squamose. Elytra comparatively long, much wider than the prothorax, gradually narrowing from the base; sharply punctate-striate, the interstices finely punctulate. Beneath densely punctate; first ventral segment slightly depressed down the middle in the ♂. Prosternum unimpressed behind the transverse subapical groove. Tibiæ strongly, in the ♀ more feebly, unguiculate.

Length $2\frac{1}{8}$, breadth 1 millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. II. Smith*).

Two males and one female. Smaller and narrower than *G. longiusculus*, with a relatively shorter and narrower prothorax, the vestiture finer and arranged in two lines down each elytral interstice, the first excepted.

93 *Geræus leucomelas*, sp. n. (Tab. XVI. figg. 18, 18a, ♀.)

Rhomboidal, narrow, shining, black, the tip of the rostrum ferruginous; clothed above with narrow white and smaller blackish scales, the white scales on the prothorax condensed into a broad marginal and a narrow median stripe, and those on the elytra (which are arranged in one or two rows down each interstice) clustered into various narrow streaks at the base and apex, a short stripe on the suture below the base, and an interrupted post-median fascia; the under surface densely albo-squamose. Head finely punctate; rostrum strongly bowed, slender, much longer than the head and prothorax, almost smooth, the antennæ inserted slightly behind the middle, the antennal club ovate. Prothorax short, constricted in front, narrowing from the base; densely, confluent punctate. Elytra triangular, separately rounded at the apex; sharply punctate-striate, the interstices sparsely punctulate. Beneath densely punctate.

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2 RR

Prosternum with a small bare fovea in the apical constriction. Anterior coxæ very narrowly separated. Legs rather slender.

Length $2\frac{3}{5}$ – $2\frac{3}{4}$, breadth $1\frac{1}{5}$ millim. (♀.)

Hab. GUATEMALA, Cerro Zunil (*Champion*).

Two females. Not unlike *G. tæniatus*, but narrower and smaller, the elytral interstices less rugose, the white scales differently arranged, the legs more slender, the prosternum with a bare fovea in front.

94. *Geræus nubifer*, sp. n. (Tab. XVI. figg. 19, 19 a, ♂.)

Rhomboidal, narrow, rather convex, nigro-piceous, the tip of the rostrum and the tibiæ and tarsi ferruginous; sparsely clothed with narrow fuscous and whitish scales, the whitish scales on the prothorax condensed into three vittæ and those on the elytra into several short streaks at the base, and a broad, indefinite, oblique, post-median fascia, which extends down the second and third interstices to the apex; the vestiture of the under surface close and white. Head finely punctate; rostrum strongly arcuate, rather slender, considerably longer than the head and prothorax, closely punctate, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax short, narrowing from the base, feebly constricted in front; densely, finely punctate. Elytra subtriangular, much wider than the prothorax, depressed along the suture at the base, the humeri swollen; finely, rather deeply striate, the interstices punctulate. Beneath densely punctate; first ventral segment broadly excavate down the middle. Prosternum unimpressed behind the transverse subapical groove. Legs long, rather slender; anterior and intermediate tarsi sharply unguiculate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{3}$ millim. (♂.)

Hab. MEXICO, Chilpancingo (*Champion*).

One male. Not unlike the Guatemalan *G. leucomelas*, but with a narrower and more finely punctured prothorax, the whitish scales on the elytra differently arranged, the legs longer and more slender, the tibiæ and tarsi ferruginous, the prosternum not foveate. Larger than *G. tenuescens*, the humeri more prominent, the vestiture differently coloured.

95. *Geræus teapanus*, sp. n.

Elliptic, shining, nigro-piceous, the legs and the tip of the rostrum ferruginous; sparsely clothed with small, narrow, white and brownish scales, the white scales on the prothorax condensed into a marginal vitta on each side and those on the elytra into various short streaks at the base and a large indeterminate patch on the disc beyond the middle; the vestiture of the elytra arranged in a single line down each interstice, that of the under surface sparse, fine, and white, dense on the metathoracic episterna. Head finely punctate; rostrum strongly arcuate, a little longer than the head and prothorax, much thickened in its basal third, closely punctate, the apical portion in the ♀ becoming abruptly slender and almost smooth, the antennæ inserted behind the middle, the club ovate. Prothorax short, rapidly and arcuately narrowing from the base, constricted in front; closely, finely punctate, with an incomplete smooth median line. Scutellum small, almost bare. Elytra subtriangular, sharply, narrowly striate, the interstices uniseriate-punctate. Beneath closely punctate; first ventral segment slightly depressed down the middle in the ♂. Prosternum unimpressed behind the transverse subapical groove. Anterior tibiæ in the ♂ sharply, in the ♀ feebly, unguiculate.

Length $2\frac{1}{8}$ – $2\frac{2}{3}$, breadth $2\frac{1}{10}$ – $2\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa in Tabasco (*H. H. Smith*).

One male and three females. In this insect the white scales on the upper surface

are condensed into a marginal stripe on each side of the prothorax and various short streaks at the base of the elytra and a patch on their disc beyond the middle. The apical portion of the rostrum of the female becomes abruptly slender and almost smooth, much as in *G. hospes*.

96. *Geræus farinosus*, sp. n. (Tab. XVI. figg. 20, 20 a, ♂.)

Elliptic, piceous, the antennæ, tip of the rostrum, and legs rufescent; densely clothed with rather broad, imbricate, yellowish-white scales, which are arranged in three or four rows down each elytral interstice (the first with two rows only), the vestiture of the under surface whiter. Head closely punctate; rostrum arcuate, stout, about as long as the head and prothorax, closely punctate and finely carinate, the apical half shining and a little smoother in the ♀, the antennæ inserted at the middle, joints 2-7 of the funiculus short, widening outwards, 2 a little longer than 3, the club ovate. Prothorax transverse, rapidly and arcuately narrowing from near the base, feebly constricted in front, the median lobe impinging on the scutellar cavity; densely, finely punctate. Scutellum small, squamose. Elytra subtriangular, finely striate, the interstices rugulose punctulate. Beneath densely punctate. Prosternum unarmed, hollowed in the middle anteriorly and also on the flanks behind the eyes. Legs short; anterior tibiæ feebly unguiculate.

Length 2-2½, breadth 1-1½ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); NICARAGUA, Managua (*Solari*).

Seven specimens, all but one from Managua, those obtained by Signor Solari being in very fresh condition. This species resembles *G. picumnus* (Herbst) and *G. albotectus* (Casey) (for examples of which we are indebted to Capt. Casey); but it has the coarse vestiture longer and denser (hiding the sculpture), the prosternum unarmed in the male, and the rostrum stouter, shorter, and closely punctate. The basal median lobe of the prothorax is considerably produced, reducing the size of the scutellum.

97. *Geræus duponti*, sp. n.

Subrhomboidal, narrow, piceous, the antennæ in part, the tip of the rostrum, tibiæ, and tarsi ferruginous; somewhat thickly clothed with small, narrow, intermixed brown and ochreous scales, the ochreous scales on the prothorax condensed into three faint vittæ and those on the elytra into various long and short streaks at the base and a faint streak on the fifth interstice beyond the middle; the vestiture of the under surface close and whitish. Head closely punctate; rostrum arcuate, moderately stout, as long as or a little longer than the head and prothorax, striate and closely punctate, smoother at the tip, the antennæ inserted slightly beyond the middle, the antennal club ovate. Prothorax transverse, subconical, feebly constricted in front; densely, finely punctate. Scutellum small, almost bare. Elytra triangular, the humeri somewhat prominent; sharply striate, the interstices rugulose punctate. Beneath densely punctate; first ventral segment hollowed down the middle. Prosternum unimpressed behind the shallow transverse subapical groove. Anterior and intermediate tibiæ strongly unguiculate.

Length 2¼-2½, breadth 1½ millim. (♂.)

Hab. MEXICO (*Dupont*, in *Mus. Brit.*); GUATEMALA, near the city (*Champion*).

Two males, varying only in the length of the rostrum. Very similar to *G. mendax*, but rhomboidal in form (the prothorax and elytra each rapidly narrowing from the base), the vestiture of the upper surface finer, that of the elytra in great part brown, the ochreous scales condensed into several streaks at the base and on the disc. The specimen in the British Museum is labelled *G. lentiginosus*?

98. *Geræus dispositus*, sp. n.

Rhomboidal, narrow, rather convex, dull, black, the legs and tip of the rostrum obscure ferruginous; sparsely clothed with narrow, whitish, setiform scales, which are regularly and uniseriately arranged down each elytral interstice; the vestiture of the under surface closer and pure white. Head closely punctate; rostrum strongly arcuate, a little longer than the head and prothorax, slightly thickened towards the base, closely punctate, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, arcuately narrowing from near the base, constricted in front, the basal median lobe short; densely, finely punctate. Scutellum almost bare. Elytra triangular, the humeri rather prominent; narrowly punctate-striate, the interstices alutaceous and uniseriate-punctate. Beneath densely punctate; first ventral segment broadly excavate down the middle. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ narrowly separated. Anterior and intermediate tibiæ strongly unguiculate.

Length $2\frac{1}{4}$, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. MEXICO, Teapa in Tabasco (*H. H. Smith*).

One male. Near *G. duponti*, from which it differs in the sparser, uniformly whitish vestiture of the upper surface, the elytral interstices dull, alutaceous, and with a single line of setiform scales. The rhomboidal outline, more prominent humeri, whitish vestiture, and dull surface separate *G. dispositus* from *G. teapanus*. The basal lobe of the prothorax is less produced than in *G. picumnus*.

99. *Geræus mendax*, sp. n.

Elliptic, nigro-piceous or piceous, the antennæ, legs, and tip of the rostrum more or less ferruginous; thickly clothed with pale ochraceous, lanceolate scales, the prothorax often with two vittæ on the disc and the elytra with the suture and one or two faint stripes fulvous, the elytral vestiture arranged in two lines on each interstice, the first with one line only; the vestiture of the under surface close and uniformly whitish or yellowish-white. Rostrum a little longer than the head and prothorax, moderately stout, strongly arcuate, thickly punctate and subcarinate, the apical half smoother in the ♀, the antennæ inserted at (♀) or slightly beyond (♂) the middle. Prothorax transverse, arcuately narrowing from the base, densely punctate. Elytra subtriangular, finely striate, the interstices rugulosely punctate. Prosternum almost unimpressed behind the transverse subapical groove, unarmed in the ♂. Anterior and intermediate tibiæ sharply unguiculate in the ♂, feebly so in the ♀.

Length $2-2\frac{1}{2}$, breadth $1-1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*), Toxpam (*Sallé*), Jalapa (*Höge*), Cordova (*U.S. Nat. Mus.*), Atoyac, Orizaba, Teapa (*H. H. Smith*); GUATEMALA, Cerro Zunil, Zapote, Capetillo, Dueñas, Guatemala city, Aceytuno, Chiacam (*Champion*), Trece Aguas (*U.S. Nat. Mus.*).

Apparently a common insect in Mexico and Guatemala. This is one of various forms resembling *G. lentiginosus*, chiefly recognizable by the rather coarse vestiture, the prothorax and elytra often with evanescent darker stripes (but always without trace of a dark spot on the suture); the prosternum of the male unarmed; the anterior and intermediate tibiæ rather strongly unguiculate in both sexes*. The mandibles are short and slightly decussate at the tip.

100. *Geræus pauxillus*, sp. n.

Elliptic, piceous, the antennæ, tip of the rostrum, and legs ferruginous; somewhat thickly clothed with small, narrow, pale ochraceous scales, which are arranged in two or three rows down each elytral

* *Centrinus relucens*, Kirsch, from Peru, is nearly related to *G. mendax*, but has fine, glistening, hair-like vestiture.

interstice, the first with one line only, the vestiture of the under surface closer and whitish. Head closely punctate; rostrum arcuate, stout, striate and closely punctate, smoother at the tip in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax short, arcuately narrowing from the base, feebly constricted in front; densely, finely punctate. Scutellum small, squamose. Elytra narrowly punctate-striate, the interstices rugulose punctate. Beneath densely punctate. Prosternum unarmed, the transverse subapical groove deeply impressed in the middle and on each side behind the eyes. Anterior coxæ narrowly separated. Legs short; anterior tibiæ with a short hook.

Length $1\frac{9}{10}$ – $2\frac{1}{4}$, breadth 1 – $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. COSTA RICA, Surubres, near San Mateo, 250 metres (*Biolley*: ♂); PANAMA, Bugaba (*Champion*: ♂), Tabernilla, Canal Zone (*Busck*, in *U.S. Nat. Mus.*: ♀).

Five specimens, those from Costa Rica captured in February 1905. Near *G. mendax*, but with the rostrum stouter and shorter, the vestiture finer, the scutellum closely squamose, the anterior tibiæ feebly unguiculate, the humeri less prominent*. The scales on the elytra are narrower than in *G. farinosus*, and not imbricate.

101. *Geræus breviculus*, sp. n. (Tab. XVI. figg. 21, 21 a, ♀.)

Subovate, short, convex, black or piceous, the rostrum in part or entirely and the antennæ, tibiæ, and tarsi ferruginous; sparsely clothed with minute, hair-like, brown scales, the elytral interstices 3, 5, and 7 each with a row of scattered, elongate, larger, white scales, the scutellum also albo-squamose; the vestiture of the under surface sparse and white. Head closely punctate, the eyes very large and somewhat narrowly separated; mandibles long and rather stout; rostrum stout, curved, about as long as the head and prothorax, striate and closely punctate in the ♂, shining and very sparsely punctate in the ♀, the antennæ inserted at the middle, the antennal club oblong-ovate. Prothorax transverse, narrowing from the base, constricted in front; densely, finely, confluent punctate. Elytra much wider than the prothorax, subtriangular, deeply punctate-striate, the interstices roughly uniseriate-punctate. Beneath closely punctate; first ventral segment broadly depressed in the middle in the ♂. Prosternum with a median sulcus extending backward between the anterior coxæ, which are separated by about one-half their own width. Anterior tibiæ sharply unguiculate in both sexes.

Length $2\frac{1}{10}$ – $2\frac{2}{3}$, breadth $1\frac{1}{8}$ – $1\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Toxipam (*Sallé*); GUATEMALA, Zapote (*Champion*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).

Three females and one male (the last-named from the Volcan de Chiriqui), varying a little in the sculpture of the prothorax. A short, convex, subovate form, with a rather long, stout rostrum, narrowly-separated eyes, and long mandibles, the scutellum albo-squamose, the alternate elytral interstices 3, 5, and 7 each with a scattered line of long white scales.

102. *Geræus nudipennis*, sp. n. (Tab. XVI. figg. 22, 22 a, ♂.)

Rhomboidal, narrow, shining, black, the tarsi and the tip of the rostrum ferruginous; the prothorax thickly clothed with long, hair-like scales, which are flavous on the disc and white along the sides and on the median lobe; the scutellum and elytra bare; the vestiture of the under surface very fine and whitish, coarser and pure white on the prosternum and on the meso- and metasternal side-pieces. Head finely punctate, foveate between the eyes; rostrum strongly arcuate, longer than the head and prothorax, stout and punctured at the base, the apical half flattened, smooth, and more slender, the antennæ inserted far behind the middle (at the basal third in the ♀), the antennal club short-ovate, stout. Prothorax transverse, conical, constricted in front; densely, finely punctate. Elytra rather convex, comparatively

* *Centrinus brunneirostris*, Kirsch, from Peru, is a nearly allied form, with denser, finer vestiture, a longer rostrum, &c.

long, subtriangular, hollowed along the suture at the base; sharply punctate-striate, the interstices flat and almost smooth. Beneath closely punctate. Prosternum unimpressed behind the transverse subapical groove. Tibiæ and tarsi slender, the tibiæ strongly unguiculate in the ♂, the anterior pair somewhat curved at the apex in this sex; tarsal claws very slender, long, and divergent.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*).

One pair. A small, narrow form, with glabrous, polished, deeply striate elytra, and short, squamose prothorax, the rostrum much thickened at the base and flattened thence to the apex. The mandibles are short and slightly decussate, and the species, therefore, will probably have to be removed eventually from the present genus.

CENTRINOPUS.

Centrinopus, Casey, Ann. N. York Acad. Sci. vi. pp. 467, 601 (1892).

Two minute forms were referred to this genus by Casey, specimens of which I have received either from him or from Mr. Wickham, and both of these, and three others, are now recorded from within our limits, partly on the authority of examples labelled "Mexico (*Truqui*)" in the Fry collection at the British Museum. *Centrinopus* will probably have to be sunk as synonymous with *Geræus*. The type, *C. helvinus*, has abruptly bent prosternal processes in the male, but no value can be attached to this character. *C. erythropus* has an unarmed prosternum and it may not really belong here.

1. *Centrinopus alternatus*. (Tab. XVI. fig. 23, ♀.)

Centrinopus alternatus, Casey, Ann. N. York Acad. Sci. vi. pp. 601, 602 (♀)¹; vii. p. 599².

Centrinopus helvinus, Casey, op. cit. vi. pp. 601, 602 (♂ ♀)³.

Hab. NORTH AMERICA, Maryland¹, Indiana², Illinois³, Ohio.—MEXICO (*Truqui*, in *Mus. Brit.*: ♀); NICARAGUA, Managua (*Solari*: ♂ ♀.)

I have seen three specimens of the var. *helvinus* of this species from Nicaragua, and one of each form from Mexico, agreeing with others from the United States communicated by Mr. Wickham and Capt. Casey. The male of *C. alternatus* before me has the prosternal spines rather short and curved, while that of *C. helvinus* has them longer and angulate (as described by Casey), and it is probable, therefore, that the spines vary in length and development, as is often the case in *Geræus*.

2. *Centrinopus mistus*, sp. n. (Tab. XVI. figg. 24, 24 a, ♂.)

Elliptic, narrow, nigro-piceous, the antennæ, tibiæ, and tarsi ferruginous; thickly clothed with narrow intermixed brown and white scales, the latter condensed into three faint lines on the prothorax and a dense spot on the scutellum, the scattered white scales on the elytra nowhere condensed into spots; the vestiture of the under surface close and white. Head closely punctate; rostrum arcuate, rather slender, thickened towards the base, a little longer than the head and prothorax, striate and closely punctate in the ♂, smoother in the ♀, the antennæ inserted slightly behind the middle, joint 1 of the funiculus long, the others short, the club ovate. Prothorax transverse, narrowing from near the base, feebly constricted in front; densely, finely punctate. Elytra narrowing from the base, flattened on the disc anteriorly, finely punctate-striate, the interstices rugulose. Beneath densely punctate; first ventral segment broadly

excavate down the middle in the ♂. Presternum armed with two acute, downwardly-directed, conical tubercles, and also deeply excavate, in the ♂, the excavation shallower in the ♀, the transverse subapical groove deeply impressed behind the eyes, anterior coxæ narrowly separated. Tibiæ strongly unguiculate in both sexes.

Length $2\frac{1}{8}$ – $2\frac{1}{4}$, breadth 1 – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*: ♂ ♀), Cuernavaca (*H. H. Smith*: ♂).

Two males and one female. Near *C. alternatus*, the brown scales predominating on the upper surface, the prothorax faintly trivittate, the white scales on the elytra widely scattered and not condensed into lines or spots.

3. *Centrinopus furfurosus*, sp. n.

Elliptic, narrow, black, the antennæ, tip of the rostrum, and legs more or less ferruginous; densely squamose, the scales yellowish-white above and white beneath, those on the elytra oval and arranged in three rows down each interstee, the first with two rows only. Rostrum arcuate, a little longer than the head and prothorax, thickened and squamose at the base, closely punctate, smoother at the tip, the antennæ inserted behind the middle. Prothorax transverse, subconical, densely, finely punctate. Elytra finely punctate-striate, the interstices densely punctulate. Presternal excavation deep, arcuate anteriorly. Anterior coxæ narrowly separated. Tibiæ feebly unguiculate.

Length $2\frac{1}{8}$, breadth $1\frac{1}{10}$ millim. (♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*).

One specimen. This species is densely squamose, like *Geræus* (*Centrinus*) *albotectus*, Casey, which also has oval scales on the elytra; but it is narrower, the mandibles are rounded externally, the anterior coxæ are more approximate, and the prosternum has a deep semicircular excavation. The dense, uniform, coarse, yellowish-white vestiture separates *C. furfurosus* from its nearest allies.

4. *Centrinopus erythropus*, sp. n.

Elliptic, rather convex, black, the rostrum, antennæ, and legs wholly rufous; thickly clothed with small narrow whitish scales, which are a little coarser and more condensed on the median lobe and sides of the prothorax, on the scutellum, and along the suture of the elytra, the vestiture of the under surface dense and pure white. Head closely punctate; rostrum a little longer than the head and prothorax, arcuate, rather stout, shining, sparsely punctate, much smoother in the ♀, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax strongly transverse, rounded at the sides from near the base, constricted and narrowed in front; densely, finely punctate, and with an incomplete, smooth, raised, median line. Elytra finely striate, the interstices densely punctate. Beneath densely punctate; first ventral segment hollowed down the middle in the ♂. Presternum unarmed in the ♂, slightly hollowed down the middle, the transverse subapical groove deeply impressed. Anterior coxæ narrowly separated. Anterior tibiæ finely unguiculate. Third tarsal joint large.

Length $2\frac{2}{5}$ – $2\frac{3}{5}$, breadth $1\frac{1}{8}$ – $1\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*: ♀), Hidalgo and Mexico city (*Barrett*, in *U.S. Nat. Mus.*: ♂).

Three specimens, two of them partly abraded. More convex than *C. alternatus*, the rostrum, antennæ, and legs clear rufous, the rostrum of the female smoother and bare from near the base, the prothorax strongly rounded at the sides and more constricted in front, the vestiture fine, the dense white scutellar spot continued down the suture.

NICENTRUS.

Nicentrus, Casey, Ann. N. York Acad. Sci. vi. pp. 468, 608 (1892).

Seven N.-American species are referred to this genus, the type of which is *Centrinus lineicollis*, Boh., and several others from our region are now added. They are separable from *Geræus* by their more oblong form, and in having the elytra very little wider than the prothorax, with the humeri not at all prominent; and from *Limnobaris* by the less decussate mandibles. The prosternum is unarmed in the male, and the sexual differences are not very conspicuous. Some of the Central-American forms resemble *Barinus curticolis* and *B. squamolineatus*, Casey, but they differ from that genus in having the tarsal claws free, the rostrum much less abruptly curved, and the first joint of the funiculus less elongate. In two of them the anterior and intermediate knees are more or less spinous or angulate at the apex (as in various *Zygopids*), the femora are shallowly sulcate beneath, and the mandibles are slightly decussate at the apex. The Central-American species may be grouped thus:—

- a. Mandibles (as seen closed) straight on their inner edge.
 - a¹. Mandibles not angulate at the sides beneath Species 1–3.
 - b¹. Mandibles conspicuously angulate at the sides beneath Species 4.
- b. Mandibles (as seen closed) short, slightly decussate at the tip.
 - c¹. Anterior and intermediate knees rounded Species 5–8.
 - d¹. Anterior and intermediate knees spinous or angulate.
 - a². Femora sulcate from about the middle beneath Species 9, 10.
 - b². Femora sulcate at the apex only beneath Species 11.

1. *Nicentrus lineicollis*. (Tab. XVI. figg. 25, 25 a, ♂.)

Centrinus lineicollis, Boh. in Schönh. Gen. Curc. viii. 1, p. 221¹ (nec *C. lineicollis*, Lec. Proc. Am Phil. Soc. xv. p. 313, and *Nicentrus lineicollis*, Casey, Ann. N. York Acad. Sci. vi. p. 609).

Nicentrus ingenuus, Casey, loc. cit. pp. 609, 610².

Hab. NORTH AMERICA, Illinois, Iowa, and Texas².—MEXICO¹ (*Dupont and Truqui*, in *Brit. Mus.*), Toxpam (*Sallé*), Cerro de Plumas, Jalapa, Oaxaca (*Höge*), Cordova (*U.S. Nat. Mus.*), Teapa (*Sallé, Höge, H. H. Smith*), Vera Cruz, Atoyac, Orizaba (*H. H. Smith*), Temax in N. Yucatan (*Gaumer*); GUATEMALA, San Gerónimo, Chiacam, Cahabon (*Champion*); NICARAGUA, Chontales (*Janson*); COSTA RICA, Irazu (*Rogers*), San José, Caché, Guatuso, Patarra, Higuito (*Biolley*), Zent, Puerto Limon (*U.S. Nat. Mus.*); PANAMA, Bugaba, Volcan de Chiriqui, San Feliz (*Champion*), Tabernilla (*U.S. Nat. Mus.*).

A common species in Mexico and Central America, and found, according to Biolley, on *Polygonum punctatum*, Elliot, and on a species of *Croton*. The North-American specimens referred to *N. lineicollis* by Casey, two of which are before me, belong to a different species*: they are narrower and more parallel-sided, the surface is duller,

* The name *N. lecontei* is suggested for this species.

and the prothorax is more densely punctate, the punctures on the disc in *N. lineicollis* being coarse and separated by narrow shining interspaces. Mr. Wickham has sent me an example of *N. ingenuus* from Iowa, this insect agreeing with some of our specimens of *N. lineicollis*. The legs are usually ferruginous, rarely infusate. The antennæ are inserted near the middle of the rostrum in both sexes. The male has the anterior tibiæ slightly curved and the first ventral segment shallowly depressed down the middle.

2. *Nicentrus forreri*, sp. n.

Oblong-ovate, nigro-piceous, the antennæ and legs ferruginous; thickly and uniformly clothed with rather coarse, narrow, yellowish-white scales, which are arranged in about two rows down each elytral interstice (the sutural one included, the third with three rows at the base), the scales on the scutellum clustered into a conspicuous whitish spot; the vestiture of the under surface denser, coarser, and whitish. Head closely punctate; rostrum moderately stout, strongly arcuate, a little shorter than the head and prothorax, closely punctate and squamose at the base, the apical half bare, shining, and sparsely punctured, the antennæ inserted at about the middle, the club ovate. Prothorax broader than long, the sides subparallel at the base and arcuately converging from the middle forwards; densely, finely punctate. Elytra a little wider than the prothorax, finely punctate-striate, the interstices rugulosely punctate. Beneath densely punctate. Prosternum shallowly foveate in the subapical constriction. Anterior coxæ rather narrowly separated. Legs short; tibiæ finely unguiculate.

Length $2\frac{2}{3}$ – $2\frac{7}{8}$, breadth $1\frac{1}{3}$ – $1\frac{1}{4}$ millim. (♀.)

Hab. MEXICO, Presidio (*Forrer*).

Three specimens, apparently all females. Smaller and more densely and uniformly squamose than *N. lineicollis*, the prothorax densely, finely punctate.

3. *Nicentrus placidus*, sp. n.

Elongate, narrow, flattened above, black; thickly clothed with small, narrow, whitish scales, which are arranged in two close rows down each elytral interstice, and are somewhat condensed along the sides and middle of the prothorax, the vestiture of the intervening spaces on the disc of the latter ochreous, that of the under surface rather coarse and white. Head finely punctate, foveate between the eyes; rostrum curved, stout, nearly as long as the head and prothorax, closely striato-punctate, in the ♀ longer, smoother, and more bowed at the base, the antennæ inserted at about the middle. Prothorax transverse, rounded at the sides anteriorly, constricted in front; densely, finely punctate. Elytra long, a little wider than the prothorax, subparallel at the base; finely punctate-striate, the interstices closely punctulate. Beneath densely punctate. Prosternum unimpressed behind the transverse subapical groove.

Length 3, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Xucumanatlan in Guerrero (*H. H. Smith*).

One pair. An elongate, small, flattened form, with short prothorax, long elytra, and stout, curved rostrum, the vestiture of the elytra arranged in two rows down each interstice. A worn female from Omilteme, with the vestiture of the elytra in great part ochraceous (except along the suture) and the tibiæ ferruginous, doubtless belongs to the same species.

N. placidus is of about the same size and shape as *N. lineicollis*, Lec. (nec Boh.), but the prothorax is more transverse and the vestiture of the elytra is closer. The mandibles are straight and pointed.

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4. *Nicentrus testaceipes*, sp. n. (Tab. XVI. figg. 26, 26 a, ♀.)

Oblong, flattened above, black or piceous, the antennæ, the rostrum wholly or in great part, and the legs rufo-testaceous; thickly and uniformly clothed with small, narrow, flavo-cinereous scales, which are arranged in three close rows down each elytral interstice, the vestiture of the under surface a little coarser and whiter. Head minutely punctate; rostrum stout, strongly arcuate, not longer than the head and prothorax, punctured and squamose to near the tip in the ♂, almost smooth in the ♀, the antennæ inserted at the middle in the ♀, and at about the apical third in the ♂, the antennal club ovate. Prothorax transverse, rounded at the sides anteriorly, narrowed and feebly constricted in front; densely, finely punctate, with a faint, abbreviated, smooth, median line. Elytra oblong, a little wider than the prothorax; finely punctate-striate, the interstices flat and densely punctulate. Beneath densely, finely punctate; ventral segments 1 and 5 slightly depressed down the middle in the ♂. Prosternum unimpressed behind the deep transverse subapical groove. Anterior coxæ somewhat distant. Anterior tibiæ with a long stout uncus at the tip in the ♂, finely unguiculate in the ♀.

Length $2\frac{1}{2}$ – $3\frac{1}{2}$, breadth 1 – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Laguna in Coahuila (*Herrera*, in *U.S. Nat. Mus.*: ♂ ♀), Mexico city (*Barrett*, in *U.S. Nat. Mus.*), Guanajuato, Toxpam (*Sallé*), Jalapa, Oaxaca (*Höge*); GUATEMALA, Dueñas (*Champion*: ♂).

Twelve females and three males, the one from Dueñas in bad condition. An oblong flattened form, with close uniform vestiture, and rufo-testaceous antennæ, rostrum, and legs. The mandibles are pointed and dehiscent at the tip, and angulate at the sides beneath. The Coahuila examples are labelled as having been found on "corn and pepper."

5. *Nicentrus candidulus*, sp. n. (Tab. XVI. figg. 27, 27 a, ♂.)

Elongate, narrow, black; above and beneath—a broad space down the disc of the prothorax and a common oblong scutellar patch on the elytra excepted—thickly clothed with white scales, the scales on the elytra oval in shape and arranged in about two rows along each interstice. Head closely punctate; rostrum stout, curved, shorter than the prothorax, rugulosely punctate and subcarinate, the antennæ inserted towards the apex, the antennal club ovate. Prothorax slightly broader than long, constricted in front, somewhat rounded at the sides; densely, finely punctate, except along a smooth, narrow, median space. Scutellum rounded, rather large. Elytra oblong, very gradually narrowing from the base; finely punctate-striate, the interstices rugulosely punctate. Beneath densely punctate. Prosternum deeply sulcate. Anterior coxæ narrowly separated. First ventral segment hollowed down the middle. Legs rather long; tibiæ strongly unguiculate.

Length 3, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. GUATEMALA, Chiacam in Vera Paz (*Champion*).

One male. The less transverse prothorax and the uniformly distributed white vestiture of the elytra separate the present species from the nearly-allied *N. decemnotatus*.

6. *Nicentrus decemnotatus*, sp. n. (Tab. XVI. figg. 28, 28 a, ♀.)

Elongate, narrow, shining, black; the prothorax with a broad marginal stripe (extending down the pleura anteriorly) and a small spot in the middle at the base, the scutellum, and the elytra each with three, sharply-defined spots—one on the disc at the base, one, very large and rounded, at about the middle, and one, small, at the apex,—densely clothed with broad, pure white, imbricate scales; the rest of the elytral vestiture black, that of the under surface (a bare space along the propleura excepted) and legs white, the disc of the prothorax almost bare. Head closely, finely punctate, squamose between the eyes; rostrum moderately stout, arcuate, a little longer than the prothorax, closely punctate, becoming smoother

towards the tip, the antennæ inserted beyond the middle, the antennal club ovate. Prothorax transverse, rounded at the sides, constricted in front, feebly sinuate at the base; densely, finely punctate, except along a narrow smooth median space. Scutellum rounded, rather large. Elytra moderately long, subparallel in their basal half, flattened on the disc; finely punctate-striate, the interstices flat and closely punctate. Beneath densely punctate. Prosternum deeply sulcate. Anterior coxæ narrowly separated.

Length 3, breadth $1\frac{1}{10}$ millim. (♀.)

Hab. GUATEMALA, Chiacam in Vera Paz (*Champion*).

One specimen, in perfect condition. It is possible that this insect may be a variety of *N. candidulus*, but the white scales on the elytra in the present species are broad and imbricate, and condensed into spots.

7. *Nicentrus fulvipes*, sp. n.

Elongate-ovate, narrow, flattened above, black, the antennæ and legs ferruginous; thickly clothed with rather coarse, narrow, brownish-white, adpressed scales, which are clustered into about two rows down each elytral interstice; the vestiture of the under surface close and whitish. Head densely punctate; rostrum arcuate, moderately stout, short, about as long as the prothorax, sparsely, finely punctate, the antennæ inserted at the middle, the antennal club ovate and rather small. Prothorax a little broader than long, somewhat rounded at the sides; densely, finely punctate. Scutellum rounded, squamose. Elytra very little wider than the prothorax, oblong, subparallel in their basal third; finely punctate-striate, the interstices rugulose. Beneath densely punctate. Prosternum deeply sulcate, the sulcus bordered on each side by a sharp ridge. Legs rather short; tibiæ strongly unguiculate.

Length $2\frac{3}{4}$, breadth 1 millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One specimen, somewhat abraded. The close, uniform, brownish-white vestiture of the upper surface, the squamose scutellum, the entirely ferruginous antennæ and legs, and the short rostrum distinguish *N. fulvipes* from its immediate allies. It is longer, less attenuate, and more densely squamose than *N. femoralis*, the knees are unarmed, and the femora are sulcate at the apex only beneath.

8. *Nicentrus puerilis*, sp. n.

Oblong-ovate, narrow, shining, black, the tibiæ sometimes ferruginous; above sparsely clothed with narrow whitish scales, which are condensed into a stripe along the sides of the prothorax and a spot in the middle at the base, the scales on the elytra arranged in a single line down each interstice; the vestiture of the under surface closer and also whitish. Head closely punctate; rostrum curved, rather slender, barely as long as the prothorax, rugulose punctate in the ♂, shining and almost smooth in the ♀, the antennæ inserted at about the middle. Prothorax nearly as long as broad, rounded at the sides anteriorly, strongly constricted in front; closely, rather coarsely punctate, except along the smooth median line. Scutellum small, squamose. Elytra a little wider than the prothorax, transversely depressed below the base, the humeri somewhat swollen; sharply punctate-striate, the interstices uniseriate-punctate. Beneath closely punctate. Prosternum broad and shallowly sulcate, the groove limited on each side by a distinct ridge. First ventral segment deeply sulcate in the ♂. Anterior coxæ narrowly separated. Legs rather long and slender; tibiæ strongly unguiculate.

Length $2\frac{2}{3}$ -3, breadth $1-1\frac{1}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, Chiacam in Alta Vera Paz (*Champion*).

Six specimens, all more or less abraded. Not unlike *N. lineicollis*, Boh., but smaller and narrower, the elytra subparallel at the base, the rostrum not so stout, the

prosternum sulcate, the legs more slender. Near *N. candidulus*, the vestiture much sparser above, the prothorax more coarsely punctate, the elytral striæ deeper, the interstices uniseriate-punctate, the prosternal sulcus shallower.

9. *Nicentrus femoralis*, sp. n. (Tab. XVI. figg. 29, 29 a.)

Elongate-elliptic, narrow, flattened above, dull, nigro-piceous; above rather sparsely and uniformly clothed with small, narrow, white scales, which are arranged in a single line down each elytral interstice; the vestiture of the under surface coarser and denser, and also white. Head closely punctate, the eyes separated by about half the width of the rostrum; rostrum stout, arcuate, about as long as the prothorax, rugulose punctate at the sides, for the rest shining and almost smooth, the antennæ inserted at about the middle. Prothorax nearly as long as broad, gradually and arenately narrowing from the base forward; closely, somewhat coarsely punctate. Elytra oblong-subtriangular, sharply, narrowly striate, the interstices rather coarsely uniseriate-punctate. Beneath densely punctate. Prosternum sulcate, tumid in front of each anterior coxa. Femora sulcate along their outer half beneath, the anterior pair feebly dentate at the apex behind, the intermediate pair somewhat produced at the inner apical angle. Tibiæ sharply unguiculate.

Length $2\frac{1}{2}$, breadth 1 millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One specimen. Less parallel-sided than *N. lobatus* and *N. macilentus*, the vestiture rather sparse and uniformly arranged above, the rostrum shorter, the prosternum tumid in front of each anterior coxa, the elytral interstices more coarsely punctate.

10. *Nicentrus lobatus*, sp. n. (Tab. XVI. figg. 30, 30 a, ♀.)

Elongate, narrow, flattened above, piceous; sparsely clothed with small, narrow, brownish-white scales, the vestiture condensed into three faint vittæ on the prothorax, a spot on the scutellum, various streaks on the basal portion of the elytra, and a transverse patch on the disc towards the apex; the under surface densely clothed with whitish scales. Head densely punctate, squamose between the eyes; rostrum arcuate, moderately stout, about as long as the prothorax, finely lineato-punctate, the antennæ inserted near the middle. Prothorax nearly as long as broad, rounded at the sides anteriorly, feebly constricted in front; densely, finely punctate. Scutellum rounded. Elytra long, a little wider than the prothorax, subparallel in their basal half, transversely depressed below the base; finely punctate-striate, the interstices rugulose punctate, 3 and 5 slightly wider than the others. Beneath densely punctate. Prosternum sulcate. Anterior coxæ narrowly separated. Femora sulcate in about their outer third beneath, the anterior pair dentate at the apex behind, the intermediate pair dentate at the apex in front.

Length 3, breadth 1 millim. (♀.)

Hab. NICARAGUA, Chontales (*Janson*).

One specimen, rather worn. In this insect the anterior and intermediate femora have one of the two lobes at their apex produced into a sharp tooth beneath, as in many *Zygopides*.

11. *Nicentrus macilentus*, sp. n.

Elongate, subparallel, flattened above, nigro-piceous or piceous; above sparsely clothed with narrow whitish scales, which are condensed into three vittæ on the prothorax and a single line down each elytral interstice; the vestiture of the under surface denser and also white. Head closely punctate; rostrum (♂) rather stout, curved, not longer than the prothorax, striate-punctate, (♀) slender, longer, straighter, and almost smooth, the antennæ inserted at about the middle, the antennal club ovate. Prothorax as long as

broad, rounded at the sides anteriorly, feebly constricted in front; densely punctate, with an incomplete, smooth, raised, median line. Elytra long, a little wider than the prothorax, subparallel in their basal half; deeply punctate-striate, the interstices narrow, uniseriate-punctate. Beneath densely punctate. Prosternum sulcate. First ventral segment sulcate down the middle in the ♂. Legs rather long and slender; anterior femora at the apex behind, and the intermediate pair at the apex in front, produced into a short tooth.

Length $2\frac{1}{4}$ –3, breadth $\frac{9}{10}$ – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, San Juan and Sabo in Vera Paz (*Champion*).

A pair from San Juan and a female from Sabo. A narrow, elongate form, with the rostrum less curved, longer, smoother, and more slender in the female than in the male; the elytra subparallel in their basal half, with deeply impressed striæ and narrow uniseriate-punctate interstices; the anterior and intermediate femora acutely produced at the tip beneath; the vestiture rather sparse above. Narrower than *N. lobatus*, the elytral vestiture not condensed into patches, the striæ not so deep, the interstices more rugose.

ODONTOCORYNUS.

Odontocorynus, Schönherr, Gen. Curc. viii. 1, p. 271 (1844); Lacordaire, Gen. Col. vii. p. 228.

Centrinus, subgenus X., Casey, Ann. N. York Acad. Sci. vi. pp. 574, 577.

This genus is sunk by Casey as a section of *Centrinus* (= *Geræus*), but it is convenient to retain the name, the various species belonging to *Odontocorynus*—all of which inhabit Mexico or the United States—having very peculiarly formed antennæ in the male sex. The type, *O. creperus*, Boh., and the two species now added, are more elongate than *O. scutellum-album* (Say), *O. larvatus* (Boh.), and their allies, and have the pygidium completely covered by the elytra. The prosternum of the male is without tubercles or spines in front of the coxæ, but in *O. creperus* and *O. latiscapus* there is a spiniform pencil of hairs between them (as in *Pseudorhianus impressus*), and in these species, too, the anterior tarsi are dilated. The Mexican forms may be tabulated thus:—

a. Pygidium completely covered by the elytra: body oblong.

a¹. Scutellum albo-squamoso, the rest of the vestiture of the upper surface sparse; prosternum sulcate and bicarinate.

a². Antennal scape (♂) widened at the apex only *creperus*, Boh.

b². Antennal scape (♂) widened from about the middle *latiscapus*, n. sp.

b¹. Scutellum, a median line on the prothorax, and the elytral suture ochraceo-squamoso; prosternum hollowed down the middle, not carinate. *sutura-flava*, n. sp.

b. Pygidium slightly exposed at the tip: body rhomboid-ovate, the elytra with closely-set vestiture *larvatus*, Boh.

1. *Odontocorynus creperus*. (Tab. XVI. figg. 31, 31 a, b, ♂.)

♂. *Odontocorynus creperus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 271¹.

Baris alboscuteclatus, Sturm, in litt.²

♂. Antennæ with the scape dilated at the apex only (as in the ♀), the four outer joints of the funiculus

widened and perfoliate, and the club armed with a sharp tooth at the base beneath (fig. 31 b); prothorax with a small polished tubercle at each anterior angle; prosternum with a spiniform pencil of hairs between the anterior coxæ (sometimes wanting); first ventral segment with a smooth polished space in the middle, in the centre of which is a compressed ferruginous tubercle; anterior tibiæ slightly hollowed towards the apex within, strongly unguiculate; anterior tarsi dilated, joints 1 and 2 each with a dense cluster of hairs on the inner edge.

Hab. MEXICO¹ (*Truqui*, in *Mus. Brit.*; *ex coll. Sturm*; *U.S. Nat. Mus.*), Acapulco, Zapotlan, Morelia, Guadalajara (*Höge*), Puebla, Izucar, Parada (*Sallé*), Omilteme, Amula (*H. H. Smith*).

Not uncommon in Mexico, whence many specimens of each sex have been received. The sculpture of the upper surface is very variable in this insect, the punctuation of the prothorax and elytral interstices being sometimes denser and confluent, especially in the males. In the female the rostrum is smoother, the antennæ are normally formed, and the tubercle at the anterior angles of the prothorax is wanting. In one fresh male from Omilteme the numerous hair-like scales on the first and fifth elytral interstices are whitish. The scutellum is densely albo-squamose. The elytra are transversely flattened on the disc before and beyond the middle. The lower side of the femora and the inner edge of the tibiæ are more or less hairy in both sexes. The length varies from $4\frac{1}{10}$ – $6\frac{3}{4}$ mm.

2. *Odontocorynus latiscapus*, sp. n. (Tab. XVI. fig. 32, ♂, antenna, from above.)

Oblong, black, the anterior tibiæ at the apex, and the anterior tarsi in great part, rufo-testaceous; sparsely clothed with short, fine, hair-like, brownish or cinereous scales, those on the elytra arranged in two lines down each interstice, the scutellum albo-squamose; the vestiture of the under surface and legs rather coarse, close, and white. Head densely punctate; rostrum moderately stout, curved, a little longer than the head and prothorax, densely striate-punctate, the scrobes very deep and somewhat sinuous; antennæ inserted at about the apical third of the rostrum, the scape sinuous, flattened and dilated in its outer half, joints 4–7 of the funiculus perfoliate, strongly dilated, the club armed with a small tooth at the base beneath. Prothorax densely, confluent punctate, except along the smooth, raised, median line, and with a small, smooth tubercle at each anterior angle. Elytra oblong-subtriangular, flattened on the disc before and beyond the middle; narrowly punctate-striate, the interstices roughly punctate. Beneath densely punctate; first ventral segment shallowly sulcate down the middle, without trace of tubercle. Prosternum sulcate, the sulcus limited on each side by a straight ridge, and with a small spiniform pencil of hairs between the anterior coxæ. Anterior tibiæ and tarsi as in *O. creperus*.

Length $3\frac{3}{4}$ – $4\frac{1}{4}$, breadth $1\frac{1}{2}$ –2 millim. (♂.)

Hab. MEXICO, Cerro de Plumas (*Höge*), Omilteme and Xucumanatlan in Guerrero 7000–8000 feet (*H. H. Smith*), Parada (*Sallé*).

Ten specimens, all males. Though this form has been obtained in two of the same localities as *O. creperus*, it cannot be included satisfactorily under that species, there being nothing intermediate amongst the numerous males examined. The species of *Loboderes* differ in a similar way. The sinuous, broadly dilated scape of the antennæ and the simply sulcate first ventral segment are characteristic. A female from Oaxaca (*Sallé*), with the vestiture of the upper surface longer and coarser, may belong here.

3. *Odontocorynus sutura-flava*, sp. n. (Tab. XVI. figg. 33, 33 a, ♂.)*Centrinus sutura-flava*, Chevr. in litt.

Oblong, black; the prothorax, scutellum, and first elytral interstice with a continuous, dense line of rather large, ochreous or whitish scales, the entire under surface also densely clothed with broad white or pale ochreous scales; the vestiture of the rest of the upper surface brown, very fine, and hair-like, that of the rostrum and legs yellowish-white or white. Head closely punctate, shallowly foveate between the eyes; rostrum a little longer than the head and prothorax, arcuate—in the ♂ opaque, stout, and striate-punctate, in the ♀ shining, more slender throughout, and very sparsely, finely punctate from near the base,—the antennæ inserted at a little behind (♀) or far beyond (♂) the middle, the club ovate. Prothorax broader than long, rounded at the sides anteriorly, constricted and narrow in front; densely, rather coarsely punctate, the punctures separate one from another. Scutellum transverse, large. Elytra oblong-subtriangular, narrowly punctate-striate, the interstices densely, roughly punctate. Beneath densely punctate. Prosternum slightly hollowed down the middle.

♂. Antennæ with joint 7 of the funiculus dentiform within and the club armed with a short sharp tooth near the base beneath (fig. 33 a); first ventral segment flattened down the middle.

Length $3\frac{2}{5}$ – $4\frac{1}{2}$, breadth $1\frac{1}{2}$ – $2\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Dupont and Truqui*, in *Mus. Brit.*), Atlixco (*U.S. Nat. Mus.*), Puebla (*Sallé*), Mexico city (*Höge*), Tehuantepec (*Mus. Brit.*).

Five males and seven females. Easily known by the dense, imbricate line of ochreous scales along the suture of the elytra, this being continued forwards on to the scutellum and the disc of the prothorax, and the dense, coarse, whitish vestiture of the under surface. The tooth on the antennal club is acute.

4. *Odontocorynus larvatus*. (Tab. XVI. figg. 34, 34 a, ♀.)

♀. *Centrinus larvatus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 218¹.

Centrinus (*Odontocorynus*) *larvatus*, Casey, Ann. N. York Acad. Sci. vi. p. 577, nota².

Hab. MEXICO^{1 2} (*coll. Chevrolat*).

The type, a female, of this species has been communicated by Dr. Sjöstedt. It is a moderately large, robust form, densely albo-squamose beneath, and thickly clothed above with rather broad whitish scales, those on the elytra (fig. 34 a) arranged in a closely-packed double or treble series down each interstice and clustered into a dense patch on the scutellum; the prothorax is densely punctate, except along the smooth median line; the elytra are narrowly striate; the prosternum is slightly depressed down the middle anteriorly; the mandibles are pointed; the antennal club is rather small.

C. larvatus, Boh., is nearly related to the North-American *Centrinus scutellum-album* (Say) and *C. salebrosus*, Casey, both of which are included by Casey in *Odontocorynus*. The antennal club is, no doubt, similarly toothed at the base in the male of the Mexican insect.

PSEUDOGERÆUS, gen. nov.

Rostrum arcuate, stout, moderately long; mandibles curved, notched within, decussate at the tip; antennal club ovate; prothorax constricted and subtubulate in front, feebly sinuate at the base; scutellum free,

subquadrate; elytra elongate; pygidium not visible; prosternum unarmed, unimpressed behind the transverse subapical groove; anterior coxæ large, exerted, separated by about one-third their own width; the ascending portion of the mesothoracic epimeron narrow, curved, and somewhat swollen at the tip, the flanks of the prothorax below the hind angles more or less hollowed for its reception (see fig. 35 *a*); femora unarmed; tibiæ strongly unguiculate; tarsal claws long, divergent; body elongate-rhomboidal, squamose.

Type, *Ps. macropterus*.

The single species referred to this genus is not uncommon in Western and N.-Western Mexico. It is perhaps most nearly related to *Centrinogyna*, Casey, which, however, has a large, vertical, and completely exposed pygidium in the male, &c. In the present genus the ascending portion of the mesothoracic epimera is often tuberculiform, as seen from above. The curved, decussate mandibles and the relatively elongate elytra separate *Pseudogeræus* from *Geræus*.

1. *Pseudogeræus macropterus*, sp. n. (Tab. XVI. figg. 35, 35 *a*, ♂.)

Nigro-piceous or black, the tibiæ sometimes ferruginous; thickly clothed with small narrow whitish and brown scales, the pallid scales mainly condensed along the sides and middle of the prothorax and on the alternate elytral interstices (these latter with three or four, and the others with two, rows of scales); the vestiture of the under surface close and whitish. Head closely punctate; rostrum stout, strongly arcuate, slightly longer than the head and prothorax, somewhat compressed at the sides in its basal half, closely striato-punctate, the apical portion smoother in the ♀, the antennæ inserted at a little beyond the middle. Prothorax broader than long, constricted in front, the sides gradually and arcuately converging from the base; densely, finely punctate, and often with indications of a smooth abbreviated median line, the narrow interspaces raised into sinuous longitudinal ridges. Elytra gradually narrowing from the obliquely truncated humeri; narrowly striate, the interstices closely punctate, the alternate ones in some specimens wider than the others. Beneath densely punctate; first ventral segment broadly depressed down the middle in the ♂. Anterior tibiæ hollowed within and slightly bowed in the ♂.

Length $3\frac{1}{2}$ – $4\frac{3}{4}$, breadth $1\frac{1}{2}$ – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Ventanas and Milpas in Durango (*Forrer*), Omilteme and Chilpancingo in Guerrero (*H. H. Smith*).

Twelve specimens from Guerrero and six from Durango. The vestiture of the upper surface varies in colour, and it is denser in most of the examples from Guerrero, which are taken as the types, than in those from the other localities.

CENTRINITES.

Centrinites, Casey, Ann. N. York Acad. Sci. vi. pp. 468, 615 (1892).

This genus is based upon a single N.-American species, *C. strigicollis*, Casey, and several others from Mexico and Central America are now added. It mainly differs from *Geræus* (= *Centrinus*, Casey) in the feebly decussate, curved, slightly notched mandibles and the coarsely sculptured surface of the body. Three of the new forms described have the intermediate and posterior tibiæ more or less thickened, and dentate just beyond the middle beneath, and the prosternum bispinose, in the male,

and one, *C. dentimanus*, has the anterior tibiæ armed with a triangular median tooth in this sex. The species may be grouped thus:—

a. Prosternum bispinose in the ♂.

*a*¹. Intermediate and posterior tibiæ thickened and armed with a sharp tooth beneath in the ♂ Species 1-3.

*b*¹. Intermediate and posterior tibiæ without tooth beneath in either sex . . . Species 4.

b. Prosternum unarmed in the ♂.

*a*¹. Anterior tibiæ armed with a triangular tooth in the ♂ Species 5.

*b*¹. Anterior tibiæ without triangular tooth in either sex * Species 6, 7.

1. *Centrinites audax*, sp. n. (Tab. XVII. figg. 1, 1 *a*, *b*, ♂.)

Elliptic, piceous, the antennæ (the club excepted) ferruginous; above sparsely clothed with rather coarse, intermixed brown and white, decumbent, setiform scales, the vestiture of the under surface coarser, closer, and wholly white. Head closely punctate, foveate between the eyes; rostrum arcuate, stout, about as long as the head and prothorax, coarsely striate-punctate and tricarinate, smoother at the tip in the ♀, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax broader than long, with the sides gradually and arcuately converging from near the base, constricted in front; rather coarsely, confluent punctate, the narrow interspaces raised into sinuous longitudinal ridges, the disc subcarinate. Elytra somewhat triangular; deeply punctate-striate, the interstices coarsely, rugosely punctate. Beneath densely punctate. Prosternum slightly depressed down the middle. Legs rather stout, rugosely punctate. Anterior coxæ narrowly separated.

♂. Prosternum armed with two short, upwardly curved spines, and with a deep excavation between them; first ventral segment depressed down the middle; intermediate (fig. 1 *b*) and posterior tibiæ somewhat dilated and each armed with a sharp tooth on the lower face beyond the middle.

Length 4-4½, breadth 2-2½ millim. (♂ ♀).

Hab. MEXICO, Pinos Altos in Chihuahua (*Buchan-Hepburn*), Ventanas in Durango (*Höge*).

A pair from Chihuahua and a female from Durango. Larger and more elongate than *Geræus pugnax* (Boh.), the vestiture not so fine and denser beneath, the punctures on the prothorax here and there confluent and separated by raised sinuous lines, the mandibles decussate, the legs stouter, the intermediate and posterior tibiæ dentate beneath and distinctly widened. *C. latierus* and *C. T-flavum* are nearly related forms. *C. audax* resembles the N.-American *C. strigicollis*, but it is larger and has peculiar male-characters.

2. *Centrinites T-flavum*, sp. n. (Tab. XVII. figg. 2, 2 *a*, *b*, ♂.)

Subrhomboidal, opaque, nigro-piceous, the antennæ, prosternal spines, and tarsi, and sometimes the tibiæ also, ferruginous; a common, interrupted, T-shaped mark at the apex of the elytra, the ante-coxal portion of the prosternum, and a spot on the mesothoracic epimera, thickly clothed with narrow ochreous scales, the rest of the elytral vestiture sparse and fuscous, with a few pallid scales intermixed, that of the prothorax ochreous and clustered into three faint vittæ, the rest of the under surface sparsely squamose. Head closely punctate, transversely grooved between the eyes; rostrum strongly arcuate,

* *C. strigicollis*, Casey, belongs to this section.

stout, considerably longer than the head and prothorax, coarsely punctate and feebly tricarinate, a little smoother at the tip in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, constricted in front, the sides more rounded in the ♀ than in the ♂; densely, confluent punctate, the narrow interspaces raised into sinuous longitudinal rugæ, the posterior half of the disc shining in the ♂. Elytra triangular, narrowly punctate-striate, the interstices roughly asperato-punctate. Beneath coarsely, closely punctate, the propleura obliquely strigose. Anterior coxæ narrowly separated. Legs rather stout, rugosely punctate; tibiæ strongly unguiculate in the ♂, more feebly so in the ♀.

♂. Prosternum armed with two long or moderately long porrect spines, and very deeply excavate down the middle; anterior tibiæ slightly curved outwards (as in the ♀); intermediate (fig. 2*b*) and posterior tibiæ dilated on the inner side, and each armed with a short tooth at about one-third from the apex beneath; first ventral segment broadly excavate down the middle.

♀. Prosternum shallowly sulcate.

Length $2\frac{4}{5}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Panistlahuaca in Oaxaca (*Sallé*); GUATEMALA, Zapote, San Gerónimo, Purula (*Champion*).

Three males and five females. Recognizable by the rugose surface, the common interrupted, T-shaped, ochreous mark at the apex of the elytra, and the pronounced sexual characters. The small tooth on the intermediate and posterior tibiæ of the male is not visible from above.

3. *Centrinites laticrus*, sp. n. (Tab. XVII. figg. 3, 3*a*, *b*, ♂.)

Rhomboidal, narrow, nigro-piceous, the tibiæ and tarsi fusco-ferruginous; sparsely clothed with narrow, hair-like, intermixed whitish and fuscous scales, which are arranged in a single series down each elytral interstice (the second having a double row at the base), the prothorax with scattered, similar, ochraceous scales; the vestiture of the legs and under surface closer. Head finely punctate; rostrum strongly arcuate, stout, as long as the head and prothorax, striato-punctate, the antennæ inserted at the middle, the antennal club ovate. Prothorax transverse, conical, constricted in front; densely, confluent punctate, and with an indistinct raised median line. Elytra subtriangular, sharply punctate-striate, the interstices flat and roughly uniseriate-punctate. Beneath closely punctate; first ventral segment broadly excavate. Prosternum shallowly sulcate and armed with two small conical tubercles. Anterior coxæ narrowly separated. Anterior tibiæ strongly unguiculate, hollowed on their inner edge from about the basal third to near the apex; intermediate tibiæ broadly (fig. 3*b*), and the posterior pair moderately, dilated on the inner side from near the base, both sharply unguiculate at the tip and armed with a minute tooth on the lower side beyond the middle.

Length $2\frac{1}{2}$, breadth $1\frac{1}{4}$ millim. (♂.)

Hab. GUATEMALA, Purula in Vera Paz (*Champion*).

One male. Very like *C. dentimanus* (♂), but with the rostrum shorter and not so stout, the anterior tibiæ without triangular tooth on the inner edge, the other tibiæ (the intermediate pair especially) broadly widened within and toothed beyond the middle beneath, the prosternum armed with two conical tubercles. Smaller than *C. T-flavum*, the elytra without definite markings at the apex, the prosternal spines reduced to conical tubercles, the anterior tibiæ hollowed within, the intermediate tibiæ more dilated.

4. *Centrinites dissipatus*, sp. n.

Rhomboidal, rather narrow, shining, piceous, the tarsi ferruginous; very sparsely clothed with narrow ochreous scales, which are intermixed with darker ones on the elytra, the ochreous scales clustered into a short streak at the apex of the second interstice and becoming more crowded on the front of the prosternum and on the metathoracic episterna. Head, rostrum, and antennæ as in *C. T-flavum*. Prothorax transverse, conical, constricted in front; densely, confluent punctate, the narrow interspaces oblique and rugiform. Elytra triangular, sharply punctate-striate, the interstices asperato-punctate. Beneath closely punctate, the propleura obliquely strigose; first ventral segment depressed down the middle. Prosternum armed in front of each coxa with a short downwardly-directed spine or conical tubercle, and also deeply sulcate. Anterior tibiæ hollowed towards the apex within and with a long terminal claw, the other tibiæ also strongly unguiculate.

Length $3\frac{2}{3}$ –4, breadth 2 millim. (♂.)

Hab. GUATEMALA, Zapote, San Juan in Vera Paz (*Champion*).

Two males, the one from Zapote (with the longer prosternal spines) being taken as the type. This insect, at first sight, looks like a worn *C. T-flavum*, but the prothorax is subconical, the elytra are shining, and the legs are less rugose; the anterior tibiæ, moreover, are hollowed within in the male, and the other tibiæ are neither dilated nor toothed in this sex. The decussate mandibles, &c., separate *C. dissipatus* from *Geræus tetrastigma* and its allies.

5. *Centrinites dentimanus*, sp. n. (Tab. XVII. figg. 4, 4 a, b, ♂.)

Rhomboidal, narrow, nigro-piceous or piceous; sparsely clothed with rather coarse, narrow, setiform, intermixed whitish and fuscous scales, which are placed in a single series down each elytral interstice, the prothorax with similar, transversely-arranged, ochreous scales; the vestiture of the under surface and legs closer and wholly whitish. Head closely punctate, obsoletely foveate between the eyes; rostrum very stout, strongly arcuate, longer than the head and prothorax, coarsely punctate and feebly tricarinate, the antennæ inserted at a little beyond the middle, the antennal club ovate. Prothorax transverse, subconical, constricted in front; densely, confluent punctate, the narrow interspaces oblique and rugiform. Elytra subtriangular, with the humeri oblique in front and almost in a line with the sides of the prothorax; sharply punctate-striate, the interstices roughly uniseriate-punctate. Beneath closely punctate; first ventral segment broadly depressed along the middle and the fifth obsoletely foveate. Prosternum shallowly sulcate, unarmed. Anterior coxæ narrowly separated. Anterior tibiæ (fig. 4 b) armed with a sharp triangular tooth on the inner edge beyond the middle.

Length $2\frac{1}{5}$, breadth $1\frac{2}{5}$ millim. (♂.)

Hab. MEXICO, Teapa (*H. H. Smith*).

Two males. Distinguishable amongst its allies by the sharply toothed anterior tibiæ, the stout, strongly arcuate rostrum, and the intermixed whitish and fuscous, setiform, uniseriately-arranged elytral vestiture. The only other Central-American Centrinid with similarly-armed anterior tibiæ is *Geræus bipustulatus*.

6. *Centrinites uniseriatus*, sp. n.

Elliptic, piceous, the antennæ and tarsi ferruginous in one specimen; the elytra clothed with intermixed ochreous and fuscous, decumbent, setiform scales, which are arranged in a single series along each interstice, the prothorax with longer hair-like scales; the vestiture of the under surface fine and rather sparse. Head closely punctate, transversely grooved between the eyes; rostrum arcuate, considerably longer than the head and prothorax, slender, thickened and closely punctate at the base, widened and

flatter at the tip, the antennæ inserted at about the basal third, the antennal club ovate. Prothorax transverse, rounded at the sides anteriorly, constricted and narrow in front; densely, finely, confluent punctate. Elytra rounded-triangular, narrowly punctate-striate, the interstices roughly uniseriate-punctate. Beneath closely punctate. Prosternum slightly depressed along the middle. Anterior coxæ separated by about their own width.

Length $3\frac{2}{3}$ – $3\frac{1}{2}$, breadth $1\frac{3}{4}$ – $1\frac{1}{2}$ millim. (♀.).

Hab. MEXICO (*Höge, in coll. Solari*); PANAMA, Volcan de Chiriqui (*Champion*).

Two females. Not unlike *C. setipennis*, but with the rostrum longer and much more slender, the antennæ inserted towards its base, and the elytra narrowly striate, with numerous, uniseriately-arranged intermixed fuscous and ochreous, setiform scales, the humeri less prominent. The elytra are more rounded at the sides than in *C. dissipatus*.

7. *Centrinites setipennis*, sp. n.

Elliptic, piceous, shining; above sparsely clothed with rather coarse, pale ochreous, hair-like scales, those on the prothorax transversely arranged, and those on the elytra setiform, semierect, and placed in a regular line along each interstice; the punctures of the under surface each bearing a minute hair-like scale, the legs also with fine hair-like scales. Head finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, as long as the head and prothorax, striate and coarsely punctate, slightly smoother in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, strongly constricted in front, the sides gradually and arcuately converging from the base; densely, finely, confluent punctate, and with indications of a raised median line, the narrow interspaces oblique and rugiform. Scutellum transverse, bare. Elytra punctato-sulcate, the interstices almost flat, the outer ones not wider than the sulci, each with a scattered row of fine setigerous punctures, the humeri rounded and not prominent. Beneath sparsely, finely punctate, the propleura obliquely strigose. Prosternum broadly, shallowly sulcate, the groove narrowing anteriorly and limited on each side by a distinct ridge. Anterior coxæ separated by about their own width. Legs rather short; tibiæ strongly unguiculate.

Length 3 – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim. (♂ ♀.).

Hab. PANAMA, Bugaba (*Champion*).

Numerous specimens, those with the rostrum a little smoother assumed to be females, no other sexual mark of distinction being apparent. The rather coarse, yellowish, setiform scales on the elytra are arranged at regular intervals along each interstice from base to apex. An isolated form, not unlike *Idiostethus tubulatus* (Lec.), and perhaps not really belonging here.

CENTRINOIDES, gen. nov.

Rostrum stout, arcuate; mandibles strongly decussate, asymmetrical, truncate anteriorly, the left mandible emarginate externally, the exposed portion of the right mandible small and angulate externally (fig. 5 b); antennal club short-ovate; prothorax tubulate in front; scutellum transverse, free; elytra with oblique non-prominent humeri, leaving the upper portion of the mesothoracic epimera visible from above; pygidium covered by the elytra; prosternum strongly hispinose in the ♂; anterior coxæ separated by about their own width; legs stout, rugose; tibiæ ridged externally; tarsal claws approximate or subconnate at the base; body oblong-ovate, coarsely sculptured, with sparse hair-like vestiture.

Type, *C. ciliaris*.

This genus includes a single species from N.W. Mexico. It is nearly related to

both *Centrinites* and *Linnobaris*. The form of the mandibles is peculiar: the left one, which is placed uppermost when they are closed *, is so deeply notched as to appear bidentate externally, and the right one is small and angulate externally. The tarsal claws are approximate at the base, *Centrinoides* in this respect approaching *Zygobaris*, Lec., and its allies.

1. *Centrinoides ciliaris*, sp. n. (Tab. XVII. figg. 5, 5 a, b, ♂.)

Subopaque, black; sparsely clothed above and beneath with short, very fine, hair-like, cinereous scales, those on the elytra a little coarser, setiform, and arranged in a single line down each interstice, the tibiae thickly set with short brown hairs at the apex within. Head closely punctate, shallowly foveate between the eyes; rostrum arcuate, rather stout, about as long as the head and prothorax, coarsely seriate-punctate, longer, smoother, and a little more slender in the ♀, the antennæ inserted at about the middle. Prothorax broader than long, rounded at the sides from near the base, feebly constricted and much narrowed in front; coarsely, densely punctate, with indications of a smooth median line. Elytra gradually narrowing from the base, coarsely punctate-striate, the interstices flat, very little wider than the striae, and each with a single series of coarse deep punctures. Beneath coarsely, closely punctate. Legs rugosely punctate.

♂. Prosternum armed with two long, or moderately long, porrect spines, which are bent downward at the tip in fully-developed specimens, and with a very deep circular excavation between them; anterior tibiae closely ciliate within.

♀. Prosternum with a broad, shallow, posteriorly evanescent, median sulcus.

Length $4\frac{1}{2}$ –5, breadth $2\frac{1}{8}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Ventanas in Durango (*Höge*).

Three males and two females, the males varying in the development of the prosternal spines. Easily recognizable amongst its allies by the single series of coarse punctures down each elytral interstice and the very fine scattered vestiture.

PSEUDOCENTRINUS, gen. nov.

Rostrum stout, arcuate, moderately long; mandibles stout, almost straight on their inner edge; antennal club ovate; prothorax feebly constricted in front, broader than long; scutellum free; elytra a little wider than the prothorax, narrowing from the rounded humeri; pygidium large, transverse, convex, vertical, and fully exposed in the ♂, not visible in the ♀; prosternum unarmed, sulcate; anterior coxæ narrowly separated; ventral segment 5 transversely tumid in the middle in the ♀ and sinuato-truncate at the apex in the ♂, 3 and 4 very short; femora unarmed; tarsal claws divergent; body elongate-or oblong-rhomboidal, squamose.

Type, *Centrinus ochraceus*, Boh.

This genus is related to *Centrinogyna*, Casey, which also has a large exposed pygidium in the male†, but may be known from it by the sulcate prosternum, the differently-shaped body, &c. The type of *Pseudocentrinus* is not unlike *Geraeus senilis*, but the other species have a very different facies. *Ps. ochraceus* and *Ps. hybrida* agree in the relative lengths of the ventral segments; but the fifth is shorter (especially in the ♀) in *Ps. deceptus*.

* They have been reversed by our artist on the Plate.

† The female only of one of the two species described by Casey has been examined by me.

1. **Pseudocentrinus ochraceus.** (Tab. XVII. figg. 6, 6 *a*, ♂; 7, 7 *a*, ♀.)

Centrinus ochraceus, Boh. in Schönh. Gen. Curc. viii. 1, p. 237¹.

Hab. NORTH AMERICA, Cameron Co., Texas.—MEXICO¹ (*Truqui*, in *Mus. Brit.*), Monterey in Nuevo Leon (*Höge*), Obrajuelo (*ex coll. Flohr*), Guanajuato (*Sallé*).

I have seen numerous examples of this well-marked species from Mexico, including the type; and Mr. Wickham has sent me one (a male) from Texas, though the insect has not been previously recorded from outside our limits. It is elongate-rhomboidal in form, densely squamose above and beneath, the prothorax with two darker vittæ on the disc, the elytra with intermixed darker or fuscous scales, which are here and there condensed into patches. The rostrum is a little smoother in its apical half in the female than in the male, and the antennæ are inserted at about the middle in both sexes. The ventral segments 1–5 are broadly flattened down the centre in the male. The second joint of the funiculus is as long as 3 and 4 united. The elytra are flattened on the disc and have rather prominent subapical callosities. The scutellum is moderately large and subquadrate.

2. **Pseudocentrinus hybrida**, sp. n. (Tab. XVII. figg. 8, 8 *a*, *b*, ♂.)

Oblong, subrhomboidal, rather dull, nigro-piceous or black, the tarsi obscure ferruginous; sparsely clothed with small, hair-like, brown scales intermixed with a few longer, coarser, whitish or ochreous scales, these latter arranged in a scattered row along each of the alternate elytral interstices and condensed into a small spot at the base of the third; the vestiture of the under surface and legs closer and uniformly cinereous. Head densely punctate; rostrum stout, curved, about as long as the head and prothorax, closely punctate to the tip, the antennæ inserted beyond the middle, joint 2 of the funiculus short, a little longer than 3. Prothorax transverse, arcuately narrowing from near the base, constricted and subtubulate in front; densely, confluent punctate, except along the smooth median line. Scutellum small, subtriangular. Elytra rather long, gradually narrowing from the rounded humeri; finely and shallowly punctate-striate, the interstices broad, flat, and densely, rugosely punctate. Beneath densely punctate; ventral segments 1–5 broadly flattened down the middle, and 5 sinuato-truncate at the apex, in the ♂, 5 about as long as 2–4 united. Prosternum narrowly sulcate. Anterior tibiæ sharply unguiculate, and slightly curved at the apex, in the ♂.

Length $3\frac{1}{10}$ –4, breadth $1\frac{1}{2}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

Four males and two females. Smaller, less elongate, and more sparsely squamose than *Ps. ochraceus*, the elytra with fine, dark, hair-like scales intermixed with a few larger, longer, whitish scales, which are arranged in a scattered series along the alternate interstices, the scutellum small. The present species bears a certain resemblance to *Pseudogeræus macropterus*, an insect occurring at the same locality.

3. **Pseudocentrinus deceptus**, sp. n.

Oblong-rhomboidal, rather convex, shining, black or piceous, the antennæ and legs sometimes wholly or in part ferruginous; sparsely clothed with rather coarse, narrow, setiform, white scales (the elytra in one specimen with a few brown scales intermixed on the disc below the base), those on the prothorax condensed into a faint submarginal vitta on each side and those on the elytra arranged in a single line down each

interstice, the lines becoming doubled or trebled at or towards the base; the under surface thickly clothed with coarse white scales. Head closely punctate, foveate between the eyes; rostrum strongly arcuate, stout, about as long as the head and prothorax, closely punctate, a little smoother in the ♀, the antennæ inserted at about the middle. Prothorax transverse, constricted in front, arcuately narrowing from the base; coarsely, closely punctate, sometimes with a smooth central line. Elytra subtriangular, punctate-sulcate, the interstices coarsely and roughly uniseriate-punctate. Prosternal sulcus well-defined, but partly hidden by the vestiture. Beneath densely punctate; ventral segment 5 slightly longer than 2. Tibiæ strongly unguiculate.

♂. Ventral segment 1 depressed down the middle and 5 sinuato-truncate at the apex, leaving the vertical pygidium narrowly visible from beneath.

♀. Ventral segment 5 transversely convex, the pygidium covered by the elytra.

Length $3\frac{2}{3}$ –4, breadth $1\frac{3}{4}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Toxpam (*Sallé*, in *Mus. Dresden*: ♀), Chilpancingo and Soledad in Guerrero (*H. H. Smith*: ♂); GUATEMALA, near the city (*Salvin*: ♂), Dueñas and San Gerónimo (*Champion*: ♂).

Seven specimens, all males but one, varying in the sculpture of the prothorax and in the colour and amount of the elytral vestiture, the single example from Chilpancingo having a transverse brown space on the disc of each elytron below the base. The shorter rostrum, the more approximate anterior coxæ, the sulcate prosternum, and the fully-exposed pygidium of the male distinguish the present species from *Geræus gaumeri*, for which it might very easily be mistaken.

GERÆOPSIS, gen. nov.

Rostrum stout, arcuate; mandibles decussate, obliquely truncate externally; antennæ inserted beyond the middle of the rostrum, the club ovate; prothorax tubulate in front; scutellum free; elytra triangular, much wider than the prothorax; pygidium not visible; prosternum unarmed, narrowly sulcate from the apex to between the anterior coxæ, the posterior portion very broad, extending backward between the intermediate coxæ, and almost covering the short mesosternum; anterior coxæ separated by considerably less than their own width, the two other pairs widely separated; legs short; femora sublinear, sulcate along their entire length beneath; anterior tibiæ hollowed at the apex externally for the reception of the first tarsal joint; tarsal claws free; body rhomboidal, broad, squamose.

Type, *G. duplocinctus*.

The insect from which the above characters are taken cannot be satisfactorily referred to any of the other genera of Centrinids here enumerated, even if no value is placed upon the mandibular structure. One species with sulcate femora (*G. arcuati-rostris*) is included under *Geræus*, but it has the rostrum, &c., differently formed. The prosternal structure approaches that of *Platyonyx*, which, however, has a longer mesosternum.

1. *Geræopsis duplocinctus*, sp. n. (Tab. XVII. figg. 9, 9a, ♂.)

Nigro-piceous or piceous, the antennæ and tarsi obscure ferruginous; the prothorax with a large space on each side at the base, and the elytra with the base and a broader transverse space towards the apex, the latter extending down the suture to the tip, clothed with small, narrow, ochraceous scales, the rest of the elytra (a few scattered whitish scales excepted) with black scales, the disc of the prothorax, the base of the rostrum, the under surface, and legs with scattered ochraceous or whitish scales. Head opaque, finely punctate, transversely grooved between the eyes; rostrum not longer than

the head and prothorax, rugosely punctate to the tip. Prothorax broader than long, transversely convex, narrowing from the base, rounded at the sides anteriorly, strongly constricted in front; densely, finely, rugulosely punctate, and with indications of a raised median line. Elytra shining, narrowly striate, the interstices very broad, flat, and densely, finely punctate. Beneath closely, the middle of the metasternum and abdomen more sparsely, punctate; first ventral segment broadly excavate.

Length 4-4½, breadth 2½-2¾ millim. (♂.)

Hab. MEXICO (*Mus. Brit.*); GUATEMALA, Capetillo (*Champion*).

Two males, the one from Mexico somewhat abraded. A broad, rhomboidal form, with a large patch on each side of the prothorax at the base and two broad fasciæ on the elytra ochraceous, the rostrum rather short, stout, and rugosely punctate, the femora and prosternum sulcate, the anterior tibiæ hollowed at the apex externally.

CESENNIA, gen. nov.

Rostrum arcuate, moderately long; mandibles curved, stout, decussate at the tip; antennæ inserted at about the middle of the rostrum, stout, the scape clavate at the apex, joints 3-7 of the funiculus strongly transverse, widening outwards, the club ovate; prothorax tubulate in front; scutellum free; elytra much wider than the prothorax, subtriangular; pygidium not visible; prosternum unarmed, declivous and broadly depressed down the middle anteriorly, deeply bifoveate in front, the space between the widely-separated anterior coxæ flattened; tibiæ strongly unguiculate; tarsal claws free; body rhomboid-ovate, squamose.

Type, *C. latecincta*.

The single species placed under *Cesennia* is very like *Geræopsis duplocinctus*, but the general structure is different: the mandibles are curved externally, the prosternum is deeply bifoveate in front (instead of narrowly sulcate down the middle), the outer joints of the funiculus are short and stout (though the club is of normal size), the anterior coxæ are very widely separated, and the femora are not sulcate beneath.

1. *Cesennia latecincta*, sp. n. (Tab. XVII. figg. 10, 10 a, ♂.)

Nigro-piceous, the antennæ, tibia, and tarsi obscure ferruginous; the elytra each with a very broad, common, arcuate, transverse band of narrow ochreous scales beyond the middle and the rest of their vestiture almost entirely dark brown; the prothorax, the base of the rostrum, under surface, and legs with small scattered ochreous or whitish scales. Head closely punctate; rostrum rather longer than the head and prothorax, much thickened towards the base, flattened and more slender in its apical half, striate-punctate. Prothorax transverse, strongly rounded at the sides anteriorly, narrow and tubulate in front; densely, finely, rugulosely punctate. Elytra gradually narrowing from the base, finely punctate-striate, the interstices broad, flat, and densely punctate. Beneath densely, the abdomen sparsely, punctate. First ventral segment depressed along the middle. Anterior tibiæ narrow, slightly hollowed externally.

Length 3¾, breadth 2 millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

One male. Narrower than *Geræopsis duplocinctus*, the elytra less widened at the base and each with a single arcuate fascia, the rostrum tapering outwards.

PLATYONYX.

Platyonyx, Schönherr, Curc. Disp. Meth. p. 272 (1826); Gen. Col. iii. p. 795; Lacordaire, Gen. Col. vii. p. 236.

A monotypic Tropical-American genus nearly related to *Centrinus*, *Odontocorynus*, and *Geræus*, though placed (with *Leptoschænus* *) in a different group of the "Baridiides vrais" by Lacordaire. This author is in error in stating that the fourth joint of the anterior tarsi is dilated in both sexes: it is a character peculiar to the male, in which sex the three basal joints of the anterior tarsi are also widened, the antennal club is elongated, the joints of the funiculus are ciliate within, &c. The anterior tibial claw is almost obsolete in both sexes; and the mandibles are straight on their inner edge and pointed at the tip.

The type of *Platyonyx*, *P. ornatus*, Boh., is a very conspicuous insect, with a broad encircling band of rust-red scales round the sides, base, and apex of the prothorax, and a similarly-coloured transverse post-basal fascia on the elytra.

1. *Platyonyx ornatus*. (Tab. XVII. figg. 11, 11 *a*, *b*, ♂.)

♂. *Platyonyx ornatus*, Boh. in Schönh. Gen. Curc. iii. p. 795¹; viii. 1, p. 270².

♀. *Leptoschænus gratiosus*, Pasc. in litt.

♂. Rostrum stout, closely punctate, the antennæ inserted near the apex, the club about as long as joints 2-7 of the funiculus, which are ciliate within; ventral segments 1 and 2 broadly flattened down the middle; pygidium almost or quite covered by the elytra; anterior tarsi with joints 1-3 ferrugineous and dilated, joint 4 broadly, subtriangularly widened; the scales on the under surface of the body white.

♀. Rostrum abruptly curved and more slender, flattened and dilated towards the tip, closely punctate at the base only, and almost smooth thence to the apex, the antennæ inserted at the middle, the club about as long as joints 5-7 of the funiculus; pygidium exposed at the apex, gradually declivous; the scales on the under surface almost wholly rust-red, similar in colour to those above.

Hab. ? MEXICO (*coll. Pascoe*: ♀); PANAMA (*coll. Fry*: ♂).—SOUTH AMERICA, Cayenne^{1 2}.

One female and two males, all contained in the British Museum.

AMERCEDES.

Amercedes, Casy, Ann. N. York Acad. Sci. vii. p. 602 (1893).

Zygobaroides, Pierce, Ent. News, xviii. pp. 382, 384 (Nov. 1907).

Mandibles (as seen closed) pointed, toothed at the base above; rostrum rather slender, long, almost straight, the short basal portion curved and abruptly thickened, at least in the ♀, gradually widened in the ♂ of *A. orthorrhinus*; antennæ inserted near the base of the rostrum, joint 1 of the funiculus a little shorter than the scape, 2 very elongate, as long as 3-6 united, the club ovate; prothorax strongly bisinuate at the base; scutellum free; elytra subtriangular; pygidium not visible; presternum very deeply sulcate throughout, the ridges extending on to the posterior portion and there becoming very prominent; mesosternum slightly depressed in the middle; femora stout, more or less sulcate along their outer half

* *Leptoschænus maculatus*, Boh., from Cayenne and Brazil, is given as doubtfully Mexican by Lacordaire (Gen. Col. vii. p. 238).

beneath; tibiae unguiculate at the inner apical angle in the ♂, unarmed in the ♀, the intermediate and posterior pairs widened at the apex externally, the anterior pair bowed inwards; tarsal claws subconnate at the base; body rhomboid-ovate, sparsely squamose.

This genus is based upon a single species found on *Zanthoxylon** (= *Xanthoxylum*) in Louisiana, and occurring also in Texas. The one now added is closely related to the type, *A. subulirostris*, Casey (= *Z. schwarzi*, Pierce), but has the rostrum dissimilarly formed in the two sexes. *Amercedes* is readily distinguishable by the structure of the prosternum, rostrum, and antennæ. The form of the mandibles, as described by Casey, can only be seen when they are fully opened.

1. *Amercedes orthorrhinus*, sp. n. (Tab. XVII. figg. 12, 12 a, ♂; 13, ♀.)

Rather convex, black; clothed above with a few small, hair-like, intermixed dark brown and whitish scales, which are arranged in a single row down each elytral interstice, the vestiture of the under surface and legs closer and wholly whitish. Head closely punctate; rostrum (♂) a little longer than the head and prothorax, finely striato-punctate, (♀) more elongate, with the tumid basal portion rugosely punctate at the sides and the slender straight apical portion almost smooth. Prothorax transverse, somewhat convex, constricted and much narrowed in front, the sides arcuately converging from the base; coarsely, closely punctate, sometimes with a smooth median line. Scutellum subtriangular. Elytra at the shoulders considerably wider than the prothorax, depressed along the suture; deeply punctate-striate, the interstices roughly uniseriate-punctate. Beneath closely punctate; first ventral segment slightly depressed down the middle in the ♂.

Length $3\frac{1}{10}$ – $3\frac{1}{4}$, breadth $1\frac{3}{4}$ – $1\frac{9}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas (*Champion*).

One male and three females.

ZYGOBARIS.

Zygobaris, Leconte, Proc. Am. Phil. Soc. xv. p. 317 (1876) (part.); Casey, Ann. N. York Acad. Sci. vi. pp. 469, 663; Pierce, Ent. News, 1907, p. 382.

This genus includes two species from North America, and a third is now added from our region. They have a very long rostrum (at least in the female), separated from the head by a transverse sulcus; the prosternum unarmed, the median depression narrowing forwards, terminating in a fovea in the subapical groove, and limited on each side by an oblique ridge; the tarsal claws connate at the base; the upper surface of the body coarsely punctate and sparsely squamose. The type is *Z. nitens*, Lec., from Florida; the other species, *Z. xanthoxyli*, Pierce, has been bred from *Zanthoxylon* (*Xanthoxylum*) berries in Texas †.

1. *Zygobaris tristicula*, sp. n. (Tab. XVII. figg. 14, 14 a, ♂.)

Rhomboidal, rather convex, shining, black; the upper surface with a few scattered, hair-like, decumbent, white scales, those on the elytra arranged in an incomplete series along the alternate interstices; the

* Biol. Centr.-Am., Botany, i. p. 168.

† An unnamed Zygobarid from Cameron Co., Texas, sent me by Mr. Wickham, appears to be referable to this species. *Z. nitens* I have not seen.

legs and under surface also clothed with scattered white scales. Head almost smooth, with a deep transverse groove between the eyes; rostrum stout, curved, usually more or less constricted at the base beneath, in the ♀ as long as the elytra, in the ♂ a little shorter, in both sexes striate and rather coarsely punctate to near the tip, the antennæ inserted at about the middle in the ♂ and nearer the base in the ♀, the antennal club ovate. Prothorax transverse, arcuately narrowing from the base, constricted in front; coarsely, densely punctate. Elytra rather short, rounded-triangular, depressed along the suture at the base; coarsely punctate-striate, the striae narrow, the interstices finely alutaceous and roughly uniseriate-punctate. Beneath coarsely, the abdomen sparsely and more finely, punctate; ventral segment 1 depressed down the middle, and 5 shallowly foveate, in the ♂. Prosternum shallowly depressed anteriorly, the depression limited on each side by an oblique ridge and terminating in a fovea in the subapical groove. Tibiæ in the ♂ strongly, in the ♀ feebly, unguiculate.

Var. Duller, the vestiture more abundant, above and beneath, the elytral interstices each with a row of hair-like white scales.

Length $2\frac{1}{10}$ – $2\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{2}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Ventanas in Durango, Cordova, Jalapa, Juquila (*Höge*); GUATEMALA, Cerro Zunil (*Champion*), Guatemala city (*Salvin*); NICARAGUA, Managua (*coll. Solari*).

Sent us in numbers from Mexico; the variety is represented by three specimens from Ventanas. The rostrum varies in length, but it is always elongate in the female, and in both sexes the puncturing extends to near the tip. A male from Capetillo, apparently belonging here, is narrower than the specimens described, and has the prothorax subconical and the ventral depressions deep. The scattered white scales on the elytra are smaller than in the North-American species of the genus.

CATAPASTINUS, gen. nov.

Rostrum stout, strongly arcuate, not longer than the head and prothorax, separated from the head by a transverse groove; mandibles curved, short, decussate; antennal club ovate; prothorax more or less tubulate in front, the apical portion very short; scutellum free; elytra much wider than the prothorax, rounded-triangular, narrowly striate; pygidium not visible; prosternum considerably developed behind the coxæ, unarmed, triangularly excavate, the excavation widening forwards and sometimes shallow, the transverse subapical groove placed midway between the coxæ and apex and impressed with two more or less distinct foveæ; legs short; femora stout, sulcate or not beneath; tarsal claws small, connate at the base; body rhomboid-ovate, sparsely squamose.

Type, *C. caseyi*.

The type of this genus is nearly related to both *Catapastus* and *Zygobaris*, but it has the prosternal depression sharply-defined and widening forwards (instead of backwards), this, however, being indistinct in *C. caleæ* and *C. alternans*, and wanting the oblique ridge on each side. The rostrum is short, as in *Catapastus*, and separated from the head by a transverse groove, as in *Zygobaris*.

1. *Catapastinus caseyi*, sp. n. (Tab. XVII. figg. 15, 15 a, b, ♂.)

Rhomboid-ovate, black; somewhat thickly clothed with small, narrow, blackish or fuscous scales intermixed with a few longer setiform white scales, the scales on the elytra seriatly arranged and the white ones mostly confined to the alternate interstices; the vestiture of the legs and under surface rather sparse, fine, and white. Head finely punctate, transversely grooved between the eyes; rostrum very stout, abruptly arched from the base, not longer than the head and prothorax, striate and thickly punctate, smoother at the tip in the ♀, the antennæ inserted at the middle, the outer joints of the funiculus

strongly transverse, the club short, ovate. Prothorax transverse, arcuately narrowing from the base, constricted in front; coarsely, densely punctate. Elytra gradually narrowing from the base, broadly rounded at the apex, somewhat flattened on the disc; narrowly striate, the interstices rugulosely punctate. Beneath densely punctate. Prosternum with a smooth, bare, flattened, triangular depression, limited on each side by an oblique ridge, the depression widening forwards and confluent with the sub-apical foveæ. Anterior coxæ separated by half their own width. Legs rugosely punctate; intermediate and posterior femora sulcate beneath from near the base to the apex.

Length $2\frac{2}{5}$ – $2\frac{4}{5}$, breadth $1\frac{1}{3}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Capetillo and Guatemala city (*Champion*); NICARAGUA, Managua (*coll. Solari*).

Eight specimens from Guatemala and three from Nicaragua. The fine dark vestiture of the elytra is arranged in one or two rows down each interstice, the longer white scales being mostly placed along the alternate ones. Less convex than *Zygobaris tristicula*, the rostrum short, stout, and abruptly arcuate, the prosternal sulcus widening forwards to the transverse subapical groove, which is impressed with two foveæ.

2. *Catapastinus caleæ*, sp. n.

Rhomboid-ovate, moderately shining, black, the antennæ ferruginous; sparsely clothed above with minute cinereous scales, these on the elytra closely placed in a single line along each interstice; the vestiture of the under surface and legs a little coarser and white. Head finely punctate, transversely grooved between the eyes; rostrum not longer than the head and prothorax, abruptly curved, rather stout, thickened and rugosely punctate at the base and for the rest sparsely, finely punctate, the antennæ inserted behind the middle, the antennal club ovate, small. Prothorax transverse, narrowing from the base, constricted in front; coarsely, densely punctate, except along a narrow smooth median space. Elytra narrowly striate, the interstices each with a single row of closely-packed coarse shallow punctures which becomes double at the base. Beneath densely, the abdomen more sparsely, punctate. Prosternum almost unimpressed behind the transverse groove, which is distant from the apical margin. Anterior coxæ separated by half their own width. Legs rugosely punctate; intermediate and posterior femora sulcate beneath.

Length $2\frac{1}{2}$, breadth $1\frac{2}{5}$ millim. (♀.)

Hab. COSTA RICA, Higuito, Pacific slope (*Biolley*).

One female, labelled as having been found on *Calea axillaris*, a Composite plant. Very like *Zygobaris tristicula*, but less convex, the rostrum (♀) much shorter, more abruptly curved, and smoother, the head distinctly punctate, the antennæ ferruginous and with a smaller club; the elytra more finely striate, the prosternum almost unimpressed and with the transverse groove placed much nearer the coxæ, &c. The upper surface is less densely punctate than in *C. caseyi*.

3. *Catapastinus alternans*, sp. n.

Rhomboid-ovate, broad, flattened above, shining, black; the sides of the prothorax, the under surface, and legs somewhat thickly clothed with narrow, hair-like, white scales, the elytral interstices 1, 3, 5, 7, and 9 each set with a scattered series of adpressed, white, setiform scales (which are clustered into small spots at the base) intermixed with a few minute pallid scales, the punctures on the other interstices also bearing minute scales. Head finely punctate, with a deep transverse groove between the eyes; rostrum not longer than the head and prothorax, abruptly bowed downwards from the base, rather stout,

compressed, rugulose punctate, and subearinate, the apical half flattened and striato-punctate. Prothorax transverse, arcuately narrowing from the base, constricted in front; sparsely, finely punctate, except along a narrow space down the middle, the punctuation becoming coarser and confluent at the sides. Scutellum transverse. Elytra considerably wider than the prothorax, narrowing from the rounded humeri; narrowly punctate-striate, the interstices broad and flat, 2 bi-, and the others uni-, seriatly asperato-punctate. Beneath densely, the abdomen more sparsely, punctate. Presternum shallowly sulcate, the groove terminating in a transverse bifoveate depression in front. Anterior coxæ separated by about their own width. Legs rugosely punctate; femora sulcate at the apex only beneath; tibiæ feebly unguiculate.

Length 3, breadth $1\frac{1}{5}$ millim. (♀.)

Hab. MEXICO, Acapulco (*Höge*).

One specimen, somewhat worn. A broad, shining black form, with a row of setiform white scales on each of the alternate elytral interstices, the sides of the prothorax and the under surface also sparsely clothed with narrow white scales. The broadly produced portion of the prosternum almost covers the mesosternum.

CATAPASTUS.

Catapastus, Casey, Ann. N. York Acad. Sci. vi. pp. 469, 664 (1892); Pierce, Ent. News, 1907, p. 382.

Two N.-American species were included under *Catapastus* by Casey and two others were subsequently added by Linell. The one now described possesses all the structural characters of the genus*. These insects are nearly related to *Zygobaris*, but have a short stout rostrum. The tarsal claws are small and connate.

1. *Catapastus ruficlava*, sp. n. (Tab. XVII. figg. 16, 16 a, b, ♂.)

Rhomboidal, narrow, black, the antennal club ferruginous; somewhat thickly clothed with rather coarse, narrow, whitish scales, the scales on the prothorax long and closely adpressed (fig. 16 b), those on the elytra arranged in a single line down each interstice, 2 and 3 with two lines on the basal half; the under surface set with larger white scales, the prosternum densely squamose in the ♂. Head squamose and densely punctate; rostrum strongly arcuate, very stout, short, in the ♂ scarcely so long as the head and prothorax and densely punctate and squamose to the tip, in the ♀ with the apical half bare and somewhat flattened, the antennæ inserted at (♀) or beyond (♂) the middle, the club ovate. Prothorax transverse, conical, densely, confluent punctate. Scutellum sparsely squamose. Elytra subtriangular, finely punctate-striate, the interstices closely punctulate. Beneath densely punctate. Prosternum excavate down the middle from the transverse subapical groove, the excavation limited on each side by an oblique ridge to as far as the anterior coxæ. Legs short; femora more or less sulcate beneath.

Length $2-2\frac{1}{8}$, breadth $1-1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Ventanas in Durango (*Höge*); GUATEMALA, Capetillo (*Champion*); NICARAGUA, Managua (*Solari*).

Five specimens, three of which are from Guatemala. The vestiture of this insect is coarser, whiter, and more uniform than in *C. conspersus* (Lec.), examples of which have been communicated by Capt. Casey and Mr. Wickham.

* Mr. Wickham has sent me a very similar unnamed form from Brownsville, Texas, and we are indebted to the Director of the U.S. Nat. Museum for an example of *C. signatipennis*, Linell, from Florida.

CNAGIUS, gen. nov.

Mandibles curved, slightly decussate at the tip; rostrum stout, curved, received in repose into the very deep smooth prosternal sulcus, the walls of which are greatly raised, almost straight, and continued along the posteriorly-produced portion of the prosternum, the mandibles received into a smooth fovea in the front of the metasternum; eyes very large, narrowly separated; antennæ inserted at the middle of the rostrum, the club ovate; head convex, large; prothorax subconical, constricted in front; scutellum small, free; elytra subtriangular; pygidium not visible; anterior coxæ separated by a little less than their own width, hollowed within; legs short, femora stout, sulcate along the greater part of their length beneath, tibiæ feebly unguiculate, tarsal claws contiguous at the base; body oblong-elliptic, narrow, polished, sparsely squamose.

Type, *C. cavipectus*.

The type of this genus has the general facies of *Colothus*, but the sternal structure is very like that of *Coleomerus*, *Coleomeropsis*, and *Amercedes*. The rostrum in repose is received into a very deep, broad, polished groove in the prosternum (the walls of which are neither sinuous as in *Coleomerus*, nor converge posteriorly as in *Coleomeropsis*), and the mandibles also are received into a fovea in the metasternum. The head is larger than in *Coluthus*, and the antennæ, rostrum, mandibles, &c. are differently formed from those of *Amercedes*. We have here one of those Barids with the rostral canal of a Cryptorrhynchid.

1. *Cnagius cavipectus*, sp. n. (Tab. XVII. figg. 17, 17 a, b, ♀.)

Shining, black; clothed above with short, scattered, semierect, blackish, hair-like scales intermixed with a few coarser, adpressed, elongate, pure white scales, these latter condensed into a short streak at the base of the suture and an incomplete line along each of the alternate elytral interstices; the under surface and legs rather sparsely set with pure white, hair-like scales. Head closely punctate, dull; rostrum about as long as the head and prothorax, subcarinate and closely striato-punctate, a little longer and smoother in the ♀. Prothorax broader than long, narrowing from the base; pitted with large, deep, rounded punctures, except along a rather broad smooth median space. Elytra sharply and narrowly striate, the interstices uniseriate-punctate. Beneath closely punctate; first ventral segment broadly flattened down the middle, and the fifth slightly depressed in the centre, in the ♂.

Length $3\frac{1}{4}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); BRITISH HONDURAS, Belize (*Blancaneaux*).

Two specimens.

COLUTHUS, gen. nov.

Mandibles toothed on their inner edge, decussate; rostrum curved, very stout, not or very little longer than the prothorax, the antennæ inserted at the apical third or fourth, the antennal club ovate; head convex, rather small; prothorax shortly tubulate in front; scutellum small, transverse, free; elytra oblong-subtriangular, blunt at the apex; pygidium not visible; prosternum deeply sulcate, the sulcus limited on each side by a sharp ridge, which terminates in a tubercle in front of the coxal cavity; anterior coxæ large, exserted, narrowly separated, hollowed within, the depression limited above by a short ridge; femora stout, the intermediate and posterior pairs sulcate along their outer half beneath, the anterior pair excavate at the apex only; tibiæ strongly unguiculate; tarsal claws free; body elongate-rhomboidal, flattened and strongly sculptured above, squamose.

Type, *C. cribrarius*.

The above characters are taken from a single variable species, which is not uncommon in Guatemala. The prosternal sulcus in this insect is continued between the coxæ, and

the ridges terminate in both sexes in a small transverse tuberculiform prominence in front of each of them, the coxæ themselves being also furnished with a short smooth ridge within, locking-in the rostrum in repose. *Coluthus* is related to *Limnobaris* (as extended by Casey), but it is sufficiently distinguished by the prosternal structure, &c.

1. *Coluthus cribrarius*, sp. n. (Tab. XVII. figg. 18, 18 a, b, ♂.)

Black or piceous, shining; clothed above with scattered, coarse, oblong, setiform, adpressed, white or yellowish-white scales intermixed with shorter and smaller, somierect, blackish scales, the vestiture of the elytra arranged in a single line along each interstice, that on the prothorax clustered along the sides (or at each hind angle) and down the middle; the under surface (a space on the propleura excepted) densely clothed with white or yellowish-white scales, the legs and rostrum with similarly-coloured scales. Head closely punctate; rostrum closely striato-punctate and squamoso to the tip, slightly smoother in the ♀. Prothorax a little broader than long, the sides rounded anteriorly and gradually converging or subparallel at the base; the surface pitted with coarse, deep, rounded punctures, except along the smooth median space. Elytra wider than the prothorax, depressed along the suture at the base; sharply punctate-striate, the interstices flat and each with an irregular row of rather coarse punctures. Beneath densely punctate; first ventral segment slightly flattened down the middle in the ♂.

Length $3\frac{1}{10}$, breadth $1\frac{3}{8}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Tapachula in Chiapas (*Höge*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Las Mercedes, Cahabon, Chiacam (*Champion*), Coban (*Conradt*); PANAMA, David (*Champion*).

Found in numbers at Chiacam in Vera Paz. The two specimens from Las Mercedes (in one of which the elytra are tumid on the disc below the base) differ from the others in having the elytra relatively wider at the shoulders; and the single example from David is less elongate, and has smaller and narrower white scales on the elytra. The Chiacam examples are taken as the types. They were found, I believe, on the flowers of a Composite plant.

CÆLONERTUS.

Cælonertus, Solari, Ann. Mus. Genova, xlii. p. 441 (1906).

Mandibles short, notched within, rounded externally, decussate at the tip when closed; rostrum short and stout, curved, received in repose in a very deep prosternal sulcus, the walls of which are greatly raised, parallel, and continued obliquely backward between the anterior coxæ; antennæ inserted at the middle of the rostrum, the outer joints of the funiculus strongly transverse and nearly as wide as the comparatively small club; prothorax deeply bisinuate at the base; scutellum very small, free, subquadrate; elytra long, subparallel; pygidium not visible; prosternum with the basal process very short; mesosternum depressed, exposed; anterior coxæ narrowly separated, hollowed and strongly carinate within; legs short; femora stout, clavate, sulcate along the greater part of their length beneath, the posterior pair reaching the second ventral suture; tarsal claws slender, free; body elongate, subcylindrical, rather convex, squamose.

The definition of this genus was drawn up from the Central-American species before I had identified the latter with *Cælonertus nigrirostris*, Solari, and it will apply equally well to his type, *C. squamulosus*. The four forms he referred to it, all from Brazil, may be known by their elongate, subcylindrical shape, and their short legs

and rostrum, the rostrum being received in a very deep parallel-sided cavity in the prosternum, as in *Cnagius*. *Cælonertus*, according to Solari, approaches the "Nertides" of Lacordaire in its subcylindrical form and visible, depressed mesosternum; it seems to me, however, best placed amongst the "Centrinides" for the present, near *Cnagius* and *Coluthus*.

1. *Cælonertus nigrirostris*. (*Cylindrobaris brevirostris*, Tab. XVII. figg. 19, 19 a, b, ♂.)

Cælonertus nigrirostris, Solari, Ann. Mus. Genova, xlii. p. 442¹.

Black or nigro-piceous; above somewhat thickly clothed with narrow white or whitish scales, the elytra with a sinuous transverse blackish fascia of variable extent below the base (reaching inward to the first stria), the vestiture of the prothorax sometimes coarser and more condensed along the sides and middle in the ♀, that of the elytra arranged in one or two rows (widening to two or three at the base) down each interstice; the legs and under surface also albo-squamosa, the vestiture becoming denser on the metathoracic episterna. Head closely punctate, the eyes well-separated; rostrum in the ♂ very short, scarcely longer than the head as seen in profile, closely striato-punctate, that of the ♀ a little longer and smoother. Prothorax nearly as long as broad, rounded at the sides anteriorly, not or feebly constricted in front; densely, somewhat coarsely punctate. Elytra moderately long, slightly wider than the prothorax, conjointly rounded at the apex; finely punctate-striate, the interstices rugulose punctate. Beneath densely punctate.

Var. The transverse dark fascia of the elytra obsolete, the vestiture arranged in a single line down each interstice; the punctures on the prothorax each bearing an oval white scale. (♂.)

Length $2\frac{2}{3}$ – $4\frac{1}{2}$, breadth 1 – $1\frac{9}{10}$ millim. (♂ ♀.)

Hab. BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, La Tinta and Panzos in Vera Paz (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).—BRAZIL, Goyaz¹.

Ten specimens, varying greatly in size and in the extent of the vestiture of the upper surface, but probably all belonging to one variable species. The variety is represented by a single very small male: all the forms were found at Belize. The type has been kindly communicated by Signor Solari for comparison.

BARILEPTON.

Barilepton, Leconte, Proc. Am. Phil. Soc. xv. p. 318 (1876); Casey, Ann. N. York Acad. Sci. vi. pp. 469, 675 (1892).

Casey recognizes four N.-American species of this genus, and the Mexican representative now recorded is so closely related to one of them that it cannot be satisfactorily separated. They are very small, cylindrical forms, with a short, stout, arcuate rostrum, long elytra, and single tarsal claws.

1. *Barilepton famelicum*. (Tab. XVII. figg. 20, 20 a, ♂.)

Barilepton famelicum, Casey, Ann. N. York Acad. Sci. vi. pp. 676, 677¹.

Hab. NORTH AMERICA, Greeley, Colorado¹.—MEXICO, Mexico city (*Höge*, *H. H. Smith*; *Barrett*, in *U.S. Nat. Mus.*).

Twelve specimens, varying a good deal in size. These insects agree very nearly with an example from Greely sent me by Mr. Wickham (but not so well with a co-type sent me by Casey). They are cupreous or æneous in colour (not black, as described); the vestiture is coarse along the sides of the prothorax and elytra, tending to form an indefinite white marginal stripe; the prothorax is slightly constricted in front and about as long as broad; the legs are sometimes in great part rufous; the rostrum is strongly bent near the base; and the first ventral segment is hollowed down the middle in the male.

CHRYASUS, gen. nov.

Rostrum stout, arcuate; mandibles short, decussate; antennal club ovate; prothorax feebly constricted in front; scutellum small, free; elytra a little wider than the prothorax, with rounded humeri; pygidium not visible; prosternum unarmed, with an oval or subtriangular excavation, extending backward between the coxæ, sometimes continued forward to the apex; anterior coxæ exerted, separated by about half their own width; femora each armed with a slender acuto tooth, and also obsoletely denticulate towards the base; tibiæ sharply unguiculate; tarsal claws minute, connate at the base; body rhomboid-ovate or oblong-rhomboidal, coarsely sculptured, almost bare.

Type, *C. cavernosus*.

Two small forms are included under *Chryasus*—one (*C. cavernosus*) with the prosternal excavation deep and reaching the apex, the other (*C. plagiatus*) with the excavation shallower and not extending beyond the transverse subapical groove. *C. cavernosus* has somewhat the facies of *Desmoglyptus crenatus* (Lec.), which, however, has a narrow, exposed, vertical pygidium and unarmed femora.

1. *Chryasus cavernosus*, sp. n. (Tab. XVII. fig. 22, ♂.)

Oblong-rhomboidal, narrow, dull, the abdomen shining, piceous, the rostrum, antennæ, and legs ferruginous, almost glabrous. Head closely punctate, transversely depressed between the eyes above, the latter strongly transverso; rostrum curved, very stout, a little longer than the prothorax, coarsely, closely punctate, shining and more finely punctured in the ♀, the antennæ inserted at about the middle, the antennal club ovate. Prothorax transverse, constricted and narrowed in front; coarsely, confluent punctate and subearinate. Elytra wider than the prothorax, narrowing from the rounded humeri, the disc transversely depressed below the base and beyond the middle; with rows of deep, oblong punctures placed in rather broad striæ, the interstices alutaceous, flattened, about as wide as the striæ. Beneath coarsely and closely, the ventral segments more finely, punctate, the first segment depressed down the middle in the ♂. Prosternum with a smooth, deep, posteriorly-narrowed, median sulcus which extends forward to the apex. Femora each with a narrow tooth and obsoletely denticulate thence to the base. Tibiæ curved, strongly unguiculate.

Length $2\frac{2}{3}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Janson*).

Two specimens. Recognizable by the coarse sculpture of the upper surface, the uneven elytra, with dull, alutaceous interstices, the distinctly curved tibiæ, and the toothed femora. The punctures on the prothorax are large and confluent.

2. *Chryasus plagiatus*, sp. n. (Tab. XVII. figg. 21, 21 *a*, *b*, ♂.)

Rhomboid-ovate, narrow, flattened above, opaque, black, the elytra each with a broad rufo-testaceous stripe on the outer part of the disc extending to near the apex, the antennæ and tarsi ferruginous, the abdomen rufous; glabrous above, subglabrous and slightly shining beneath. Head very finely punctate; rostrum stout, curved, about as long as the head and prothorax, striato-punctate to the tip, the antennæ inserted at the middle, the antennal club ovate. Prothorax broader than long, subconical, feebly constricted in front; densely, obliquely strigose, the narrow depressed spaces very finely, confluent punctate. Elytra narrowing from about the basal third, the obliquely truncated humeri in a line with the sides of the prothorax; deeply punctato-sulcate, the interstices dull and convex throughout. Beneath closely, the abdomen more sparsely, punctate. Prosternum subtriangularly depressed down the middle, the depression not extending beyond the subapical groove. Legs rather elongate; femora sublinear, each armed beyond the middle with a small acute tooth, the intermediate and posterior pairs also with several minute denticles nearer the base.

Length $2\frac{2}{5}$, breadth $1\frac{1}{8}$ millim. (♂?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen only of this peculiar little insect has been obtained. The longitudinally strigose prothorax, the convex elytral interstices, the less prominent humeri, the longer femora, the straighter tibiæ, &c., distinguish it from *C. cavernosus*.

DEIPYRUS, gen. nov.

Rostrum very stout, arcuate, moderately long, and separated from the globose head by a deep transverse groove; mandibles short, decussate; antennæ with an ovate club, the outer joints of the funiculus transverse; prothorax feebly constricted in front; scutellum small, flat, subtriangular; elytra a little wider than the prothorax, with the humeri oblique and not prominent; pygidium not visible; prosternum unarmed, with a deep transverse excavation near the apex, limited on each side by a short oblique ridge; anterior coxæ separated by rather less than their own width; femora unarmed; tarsal claws long, divergent; body oblong-elliptic, coarsely sculptured, setose.

Type, *D. hirsutulus*.

The single species from which the above characters are taken is one of the numerous isolated Tropical-American forms that seems to require a distinctive generic name. It approaches *Chryasus*, *Centrinites*, and *Limnobaris* (as extended by Casey), and the vestiture is like that of *Chætobaris*.

1. *Deipyrus hirsutulus*, sp. n. (Tab. XVII. figg. 23, 23 *a* *.)

Rather narrow, shining, piceous or rufo-piceous; the upper surface and legs somewhat thickly clothed with long, suberect, fulvous setæ, the under surface with scattered decumbent hairs. Head finely alutaceous, deeply transversely sulcate between the eyes; rostrum about as long as the head and prothorax, thickly punctate, the antennæ inserted at the middle. Prothorax transverse, narrowed and constricted in front; coarsely, confluent punctate, and sometimes with an indication of a short median carina. Elytra punctato-sulcate, the interstices about as wide as the striæ, becoming a little broader and flatter towards the suture, each with a scattered row of rather coarse punctures. Beneath coarsely, sparsely punctate. Legs short; tibiæ feebly unguiculate.

Length $2\frac{1}{8}$ – $2\frac{1}{2}$, breadth 1 – $1\frac{1}{8}$ millim.

Hab. PANAMA, Bugaba (*Champion*).

* The insect is narrower than represented on the Plate.

Seven specimens, not exhibiting any perceptible sexual marks of distinction. This species somewhat resembles *Chryasus cavernosus*, but it is strongly setose, the femora are unarmed, the tarsal claws are long and divergent, the head is almost impunctate, &c. The elytra are sculptured as in *Pseudorhianus compressirostris*, and the humeri are rounded externally and oblique in front.

ALANDRINUS.

Calandrinus, Leconte, Proc. Am. Phil. Soc. xv. p. 305 (1876) ; Casey, Ann. N. York Acad. Sci. vi. pp. 468, 617.

Casey refers three species from Colorado and New Mexico to this genus, the type of which is *C. grandicollis*, Lec., the latter apparently extending into our region. The tarsal structure is peculiar, approaching that of *Zaglyptus*.

1. *Calandrinus grandicollis*. (Tab. XVIII. figg. 1, 1 a.)

Calandrinus grandicollis, Lec. Proc. Am. Phil. Soc. xv. p. 305¹; Casey, Ann. N. York Acad. Sci. vi. pp. 468, 618².

Hab. NORTH AMERICA¹, Colorado².—MEXICO (*Truqui*, in *Mus. Brit.*).

There is a rather worn specimen of this insect in the Fry collection labelled as from "Mexico." An example from Colorado is figured.

ZAGLYPTUS.

Zaglyptus, Leconte, Proc. Am. Phil. Soc. xv. p. 317 (1876) ; Casey, Ann. N. York Acad. Sci. vi. pp. 468, 663.

Of this peculiar genus two species are known, and four others are now added from within our limits, all of them apparently being rare. They are minute, convex, rhomboidal forms, with the third tarsal joint narrow (and not bilobed) and the body clothed with very long, scattered, bristly hairs. *Zaglyptus* (like *Microhyus*, amongst the Cryptorrhynchids) extends southward from the United States to Panama. The four Central-American forms may be grouped thus :—

Rostrum stout, arcuate; elytral interstices narrow, costate; body ferruginous . . . *costatus*.

Rostrum more slender and less curved.

Body black, the elytra rufescent or piceous; elytral interstices broader than the stræ, feebly convex *crispus*.

Body ferruginous or testaceous.

Prothorax somewhat coarsely punctate; elytral interstices broad, flattened . . . *carinifer*.

Prothorax finely punctate; elytral interstices narrow, convex *minutissimus*.

1. *Zaglyptus costatus*, sp. n. (Tab. XVII. figg. 24, 24 a.)

Short, rhomboidal, convex, fusco-ferruginous or ferruginous; above clothed with scattered, long, erect, fine, pallid setæ, those on the prothorax intermixed with fine, adpressed, hair-like scales. Head transversely depressed above the narrowly-separated eyes; rostrum a little longer than the head and prothorax, stout, arcuate, finely striate, the antennæ inserted at about the middle. Prothorax short, conical, strongly constricted in front; rather coarsely, densely punctate, and with a faint median carina. Elytra transversely convex, subtriangular, parallel at the base; punctato-sulcate, the interstices narrowly costate and almost smooth. Beneath sparsely punctate.

Length $1\frac{2}{5}$ – $1\frac{1}{2}$, breadth 1 millim.

Hab. GUATEMALA, San Juan in Vera Paz 2000 feet (*Champion*), Trece Aguas (*Barber and Schwarz*, in *U.S. Nat. Mus.*).

Two specimens, both from the northern side of the Polochic Valley. Shorter than *Z. sulcatus*, Lec., the rostrum shorter, stouter, and more curved, the body almost entirely ferruginous.

2. *Zaglyptus crispus*, sp. n. (Tab. XVII. figg. 25, 25 a.)

Rhomboidal, shining, nigro-piceous or black, the elytra, antennæ, and tarsi piceous or rufescent; above clothed with long, scattered, suberect, curled, pallid or ochreous setæ intermixed with fine, similarly-coloured, adpressed, hair-like scales. Head faintly foveate between the eyes; rostrum feebly curved, rather slender, longer than the head and rostrum, striato-punctate, the antennæ inserted at about the middle. Prothorax short, conical, feebly constricted in front; coarsely, closely punctate, with a short median carina at the base. Elytra rather convex, much wider than the prothorax, subtriangular, parallel at the base; with rows of coarse, deep punctures placed in narrow striæ, the interstices flattened or convex, broader than the striæ, and faintly punctulate. Beneath alutaceous, dull, sparsely punctate, the ventral segments 3–5 smoother. Presternum shallowly sulcate behind the deep transverse subapical groove, the basal portion foveate in the middle. Legs slender.

Length $1\frac{4}{5}$ –2, breadth 1 – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*); GUATEMALA, Totonicapam 10,500 feet, Calderas 7000 feet (*Champion*).

Three specimens, evidently including both sexes, varying in the colour of the elytra and in the depth of the elytral striæ. Less convex than the N.-American *Z. sulcatus*, Lec. (for examples of which we are indebted to Mr. Wickham and the U.S. Nat. Museum), the rostrum longer and not so stout, the elytral interstices flatter, the under surface less coarsely punctate.

3. *Zaglyptus carinifer*, sp. n.

Rhomboidal, convex, shining, testaceous; above clothed with scattered, long, fine, erect, ochreous setæ, those on the prothorax intermixed with fine, adpressed, hair-like scales. Head sparsely, minutely punctate; rostrum rather slender, curved, slightly longer than the head and prothorax, finely striato-punctate, the antennæ inserted at a little beyond the middle. Prothorax short, conical, constricted in front; somewhat coarsely, confluent punctate, and carinate down the middle. Elytra with rows of moderately coarse punctures placed in narrow striæ, the interstices almost flat on the disc, convex at the sides, broad, and faintly punctulate. Beneath sparsely, coarsely punctate, the ventral segments 3–5 smoother. Presternum broadly and shallowly sulcate, the transverse subapical groove fine, shallow, and placed close to the apical margin, the basal portion without fovea. Legs slender.

Length $1\frac{9}{10}$, breadth $1\frac{1}{10}$ millim.

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen, somewhat immature. Closely related to *Z. crispus*; the setæ more erect, the prosternum distinctly sulcate and with a shallower subapical groove, the median carina of the prothorax longer. Larger and broader than the N.-American *Z. striatus*, Lec., the rostrum longer and less curved, the prothorax distinctly carinate, the elytra with coarser seriate punctures and broader interstices.

4. *Zaglyptus minutissimus*, sp. n.

Short, rhomboidal, rufo-testaceous, clothed with scattered fine, erect, pallid setæ. Head dull, alutaceous; rostrum curved, about as long as the head and prothorax, slightly thickened towards the base, dull and finely striate, smoother and shining at the tip, the antennæ inserted at about the middle. Prothorax short, conical, constricted in front, closely, finely punctate, and with a very fine median carina. Elytra shining, punctato-sulcate, the interstices convex and very little wider than the striæ.

Length $1\frac{1}{10}$ – $1\frac{1}{5}$, breadth $\frac{3}{4}$ – $\frac{7}{8}$ millim.

Hab. GUATEMALA, Senahu (*Champion*), Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*).

Four specimens, all from Alta Vera Paz, two of them with the prothorax dull and alutaceous, and the punctures very shallow, this being probably due to immaturity. A close ally of the N.-American *Z. striatus*, Lec., but differing from it in the more curved rostrum, the smoother, feebly carinate, duller prothorax, the convex elytral interstices, and the shorter and finer setæ. These two insects are amongst the smallest known Barids.

PLOCAMUS.

Euchætes, Leconte, Proc. Am. Phil. Soc. xv. p. 319 (1876) (nomen præocc.).

Plocamus, Leconte, loc. cit. p. 320; Casey, Ann. N. York Acad. Sci. vi. pp. 469, 681 (1892).

Eunyssobia, Casey, loc. cit. pp. 469, 679.

The genera *Euchætes* and *Plocamus* were each based upon a single N.-American form, both of which extend southward into the "tierra caliente" of Guatemala; but they cannot be maintained as distinct, the two new species now added forming a connecting-link between them. *Plocamus*, as noted by Casey, will probably have to be referred to a separate group of the Barini, the mandibles and rostrum being peculiarly shaped; the third tarsal joint is small, and the body is strongly setose, as in *Zaglyptus*, near which the genus can be placed for the present. The four species, two of which possess a somewhat remarkable geographical distribution, may be grouped thus:—

Prothorax uneven, nodose.

Rostrum abruptly thickened towards the base, at least in the ♂.

Upper surface with very long, erect, rigid setæ *echidna*, Lec.

Upper surface with short, stout, clubbed setæ *clavisetis*, sp. n.

Rostrum gradually widened towards the base; upper surface with short, fine,

blunt setæ *hispidulus*, Lec.

Prothorax even; rostrum gradually widened towards the base; upper surface

with very long, erect, rigid setæ *hystrix*, sp. n.

1. **Plocamus echidna.** (Tab. XVII. figg. 26, 26 a.)

Euchates echidna, Lec. Proc. Am. Phil. Soc. xv. p. 320¹.

Eunysobia echidna, Casey, Ann. N. York Acad. Sci. xv. p. 680².

Hab. NORTH AMERICA, Illinois¹, Ohio, Kentucky, and Iowa².—GUATEMALA, Pantaleon, Pacific slope (*Champion*).

The single specimen of this remarkable insect obtained in Guatemala has the large white scales on the elytra condensed into a transverse patch at the middle of the base, another at the middle of the sides, an elongate streak on the suture below the base, and a common ∞ -shaped patch along the suture at the apex. These markings vary somewhat in extent in the N.-American examples sent me by Capt. Casey, Mr. Wickham, and the U.S. National Museum. The setæ are very long, erect, and rigid in this insect.

2. **Plocamus clavisetis**, sp. n. (Tab. XVII. figg. 27, 27 a, ♀.)

Subelliptic, flattened above, piceous; variegated above with a dense crust of large, adherent, greyish-white, brown, and blackish scales, the blackish scales on the elytra condensed into a transverse or subtriangular patch on the inner part of the disc beyond the middle, several patches along the sides, and a few small scattered spots, the under surface with a uniform whitish crust; the upper surface also set with short, stout, erect, clubbed, scattered setæ, which extend along the thickened basal portion of the rostrum. Eyes rather small, distant from the anterior margin of the prothorax. Rostrum long, curved, slender, somewhat abruptly thickened towards the base in the ♂, more elongate and more gradually widened basally in the ♀. Prothorax transverse, strongly constricted in front; densely punctate, nodose on the disc and along the sides, the disc also with an obliquely depressed space on each side of the shallow median channel. Elytra a little wider than the prothorax, depressed along the suture anteriorly; punctate-striate, the interstices densely punctulate.

Length $1\frac{1}{2}$ – $2\frac{1}{4}$, breadth $\frac{2}{3}$ – $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. GUATEMALA, Livingston, Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*), Chacoj in Alta Vera Paz, Pantaleon (*Champion*).

Found in abundance at Chacoj (La Hamaca) in the valley of the Polochic, the specimens varying considerably in size. More flattened than *P. echidna*, the long rigid bristles replaced by very short, stout, clubbed setæ, the markings of the elytra very similar to those of *P. hispidulus*, the rostrum less abruptly widened at the base, especially in the female. This species, like *P. hispidulus* and *P. hystrix*, inhabits the low hot regions of both the Atlantic and Pacific slopes.

3. **Plocamus hispidulus.** (Tab. XVII. figg. 28, 28 a, ♂.)

Plocamus hispidulus, Lec. Proc. Am. Phil. Soc. xv. p. 320¹; Casey, Ann. N. York Acad. Sci. vi. p. 682².

Hab. NORTH AMERICA, Southern United States¹, Washington¹, Maryland², &c.—GUATEMALA, Livingston (*Barber, in U.S. Nat. Mus.*), Chacoj in Vera Paz, Zapote (*Champion*).

Found in numbers at Chacoj in the Polochic Valley, in company with *P. clavisetis*, the specimens agreeing perfectly with others before me from the United States.

4. *Plocamus hystrix*, sp. n. (Tab. XVII. figg. 29, 29 a.)

Subelliptic, nigro-piceous or black, the base and apical margin of the elytra, the legs in part or the tarsi only, rostrum, and antennæ, rufescent or ferrugineous; the elytra each with a transverse fascia on the disc just beyond the middle and one or two small spots near the suture below the base, the prosternum in front, and the meso- and metathoracic side-pieces clothed with large, imbricate, opalescent, white scales, the rest of the squamiform vestiture in great part dark and inconspicuous, whitish at the apex of the elytra, along the middle and sides of the prothorax, and on the front of the head, that on the rostrum and base of the elytra ochreous, the upper surface also thickly set with very long, erect, dark setæ. Eyes large, narrowly separated. Rostrum about as long as the elytra, arcuate, slender, gradually widened towards the base, finely striato-punctate, the basal portion rugulose and squamose. Prothorax transverse, evenly rounded at the sides anteriorly, strongly constricted and tubulate in front, densely punctate. Elytra wider than the prothorax, subtriangular, punctate-striate, the interstices densely punctulate. Anterior tibiæ strongly unguiculate.

Length $1\frac{1}{2}$ – $1\frac{7}{8}$, breadth $\frac{2}{3}$ – $\frac{7}{8}$ millim.

Hab. GUATEMALA, Zapote, Pacific slope (*Champion*), Livingston (*Barber*, in *U.S. Nat. Mus.*).

Five specimens, sex not ascertained, the one from Livingston, on the Atlantic coast, in beautifully fresh condition. Differs from the other species of the genus in the evenly rounded surface of the prothorax and in having a sharply-defined, opalescent, white fascia on each elytron. The vestiture is like that of *P. echidna*, and the rostrum is shaped as in *P. hispidulus*.

LIMNOBARIS.

Limnobaris, Bedel, Faune Col. Bassin Seine, vi. p. 183 (1885); Casey, Ann. N. York Acad. Sci. vi. pp. 468, 623.

I follow Casey in including a number of oblong or oval Barids, with strongly decussate mandibles and completely covered pygidium *, in *Limnobaris*, the type of which is the Palæarctic *L. T-album* (Linn.). Some of the American forms (such as *L. carbonaria*, Fabr.) have very long prosternal spines in the male, and one (*L. latidens*) also has the anterior femora armed with a stout blunt tooth in both sexes; others, again, have the anterior tibiæ dentate in the male (*L. dentifer*), or the antennal club greatly elongated in this sex (*L. cylindriclava*). *L. calandriiformis*, *latidens*, and *quadricollis* approach the “Madarides” in having the broad flattened prosternal process almost on a level with the metasternum (not, however, covering the mesosternum) †, but they are connected with the others by intermediate forms. *Baridius æthiops*, *funereus*, and *aratus*, Kirsch, belong to *Limnobaris* as here understood. The

* In a few species with the elytra separately rounded at the apex the extreme tip is visible.

† The *Baris complanata* of Dejean's Catalogue, alluded to by Lacordaire under the genus *Lyterius* (Gen. Col. vii. p. 251, nota), is another form of this kind.

genus is represented by about the same number of species in North and Central America; those from our region may be grouped thus* :—

- a. Prosternum bispinose in ♂.
 - a¹. Anterior femora with a broad blunt tooth in both sexes Species 1.
 - b¹. Anterior femora unarmed.
 - a². Anterior tibiae without subapical tooth in ♂.
 - a³. Prothorax strongly tubulate in front: species large Species 2.
 - b³. Prothorax moderately or feebly constricted in front.
 - a⁴. Body broader, elytra flattened, prosternum bifoveate in ♀, anterior coxæ widely separated Species 3, 4.
 - b⁴. Body narrower, elytra less depressed, anterior coxæ more approximate Species 5-8.
 - b². Anterior tibiae with a subapical tooth in ♂ Species 9.
- b. Prosternum unarmed in ♂.
 - c¹. Antennal club ovate.
 - c². Upper surface with a rather sparse uniform vestiture Species 10.
 - d². Upper surface with a close uniform vestiture Species 11.
 - e². Upper surface with scattered scales, those on the prothorax sometimes clustered into lateral vittæ, and those on the elytra into transverse fasciæ or one or two (interrupted or complete) lines along each interstice Species 12-20.
 - f². Upper surface bare Species 21, 22.
 - d¹. Antennal club cylindrical, very elongate Species 23.

1. *Limnobaris latidens*, sp. n. (Tab. XVII. figg. 31, 31 a, ♂.)

Subelliptic, rather broad, flattened above, shining, black, the tarsi, apex of the rostrum, base of the antennæ, and prosternal spines sometimes more or less ferruginous; the sides of the prothorax with scattered, and the elytral interstices with seriatly-arranged hair-like, yellowish-white scales, those on the elytra becoming more crowded at the base and sometimes in part infusate; the under surface and legs also with minute hair-like scales. Head transversely grooved between the eyes, sparsely, minutely punctate; rostrum strongly arcuate, moderately stout, rather longer than the head and prothorax, seriate-punctate, the basal portion rugose at the sides; joint 2 of the funiculus longer than 3. Prothorax nearly as wide as the elytra, broader than long, rounded at the sides anteriorly, narrow and tubulate at the apex, feebly sinuate at the base, the short median lobe transversely grooved; coarsely and closely punctate at the sides, sparsely and finely so on the disc, a narrow space down the middle of the latter impunctate. Scutellum oblong. Elytra deeply striate, the striæ feebly punctate, the interstices flat, rather coarsely and closely uniseriate-punctate, the rows of punctures becoming double towards the base. Beneath coarsely and confluent, the ventral segments more finely, punctate. Prosternum with a deep subquadrate cavity in front limited on each side by a longitudinal ridge. Anterior coxæ separated by rather more than their own width. Anterior femora with a stout, blunt, oblique tooth towards the apex, the others unarmed.

♂. Prosternum in fully-developed examples armed with two short spines, and with a very deep circular cavity between them.

Length $2\frac{1}{2}$ -4, breadth $1\frac{1}{5}$ -2 millim. (♂ ♀.)

Hab. GUATEMALA, Teleman and San Gerónimo in Vera Paz (*Champion*: ♀); PANAMA, Bugaba (*Champion*: ♂), Tabernilla, Canal Zone (*Busck*, in *U.S. Nat. Mus.*: ♂ ♀).

* The male is unknown of *L. quadricollis* and *L. uniformis*.

Twelve specimens, one of the males with the prosternal spines almost obsolete. Easily recognizable by the stout, oblique, blunt tooth on the anterior femora. The uniseriately-arranged vestiture of the elytral interstices becomes double towards the base, and this is particularly noticeable in the male.

2. *Limnobaris carbonaria*. (Tab. XVII. figg. 30, 30 a, ♂.)

♀. *Calandra carbonaria*, Fabr. Syst. Eleuth. ii. p. 437¹.

♀. *Centrinus carbonarius*, Boh. in Schönh. Gen. Curc. viii. 1, p. 193 (nec Gen. Curc. iii. p. 748)².

Oblong-ovate, flattened above, shining, black, the prosternal spines and funiculus sometimes ferruginous; the elytra with an oblong patch at the base of the second interstice and a narrow line at its apex, an elongate streak on the fourth interstice beyond the middle, and sometimes some other spots at the base, densely clothed with hair-like ochreous scales, the rest of the upper surface almost bare, the under surface with scattered, hair-like, minute, ochreous scales. Rostrum arcuate, stout, not or very little longer than the prothorax, thickly punctate, the antennæ inserted at the middle in both sexes, the antennal club ovate. Prothorax nearly as long as broad, rounded at the sides anteriorly, narrow and tubulate in front; sparsely, finely punctate, the punctuation becoming denser and closer at the sides and on the flanks, the base distinctly margined. Scutellum subquadrate. Elytra very little wider than the prothorax, broadly and conjointly rounded at the apex, the disc transversely depressed at the sides below the base; sharply striate, the striæ feebly punctate, the interstices flat, sparsely, minutely punctate on the disc, seriato-punctate at the sides, 6-9 narrowly costate towards the apex. Beneath sparsely punctate. Prosternum flattened between the anterior coxæ, which are separated by about their own width. Femora more or less clavate.

♂. Prosternum armed with two very long sinuous spines which extend beyond the front of the head (fig. 30 a), and also with an oblong deep cavity in the middle; anterior tibiæ sparsely ciliate within.

Length $4\frac{1}{2}$ -7, breadth $2-3\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*), Teapa (*H. H. Smith*); GUATEMALA, Senahu in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt*); PANAMA, Lion Hill (*Busck*, in *U.S. Nat. Mus.*).—SOUTH AMERICA^{1 2} (*Mus. Brit.*).

Two males and four females. This insect has the general facies of a *Cylindrocerus* or *Madarus*. The long prosternal spines are similarly formed in the two males received*.

3. *Limnobaris calandriiformis*, sp. n. (Tab. XVII. figg. 32, 32 a, ♂.)

Subelliptic, rather broad, flattened above, shining, black, the tarsi, tip of the rostrum, prosternal spines, and base of the antennæ more or less ferruginous; the upper surface almost glabrous, the under surface and legs with minute whitish hair-like scales. Head transversely sulcate and shallowly foveate between the eyes, finely punctate; rostrum moderately stout, about as long as the prothorax, striate and thickly punctate to the tip, tapering and with the apical half smoother in the ♀; joint 2 of the funiculus very short. Prothorax nearly as wide as the elytra, broader than long, the short anterior portion tubulate; coarsely, closely punctate, the punctuation becoming sparser and finer along the middle of the disc. Scutellum subquadrate. Elytra not much longer than the prothorax, subcordate; punctato-sulcate, the interstices flat, uniseriate-punctate, the series becoming double towards the suture. Beneath coarsely and very closely, the ventral segments more finely, punctate. Anterior coxæ widely separated. Femora clavate.

♂. Prosternum with two very long sinuous spines and a deep excavation between them (fig. 32 a), in undeveloped specimens with two short straight spines placed further from the coxæ and a shallow excavation; anterior tibiæ finely ciliate on their inner edge, the anterior tarsi also with a few long hairs.

♀. Prosternum flattened, bifoveate in the anterior constriction.

Length 3-4, breadth $1\frac{2}{5}$ -2 millim. (♂ ♀.)

* Our artist has unfortunately drawn (fig. 30 a) a male with one of the spines broken off at about one-third from the base.

Hab. BRITISH HONDURAS, Belize (*Blancaneaux*: ♂); GUATEMALA, Panzos (*Conradt*: ♂ ♀); COSTA RICA, Paso Real (*Pittier*: ♀), Puerto Limon (*Knab*, in *U.S. Nat. Mus.*: ♂ ♀).

Seven specimens, the prosternal spines in the three males varying greatly in development. Very like *L. latidens*, but with the upper surface almost bare, the anterior femora unarmed, the anterior coxæ widely separated, the scutellum subquadrate, the prosternum of the female bifoveate anteriorly, the second joint of the funiculus scarcely longer than the third. The extreme tip of the last dorsal segment is usually visible. The undescribed *Baris complanata* of Dejean is very like the present insect.

4. *Limnobaris quadricollis*, sp. n. (Tab. XVII. figg. 33, 33 a, ♀.)

Elongate, flattened above, shining, black, the legs and rostrum piceous, the base of the antennæ ferruginous; the upper surface almost bare, the under surface and legs sparsely clothed with minute whitish scales. Head finely punctate, transversely sulcate between the eyes; rostrum curved, about as long as the prothorax, moderately stout, punctate-striate, the apical half more slender and somewhat closely punctate; joint 2 of the funiculus very short, narrower than 3. Prothorax nearly as long as broad, subquadrate, the sides rounded anteriorly, the anterior lobe narrow; closely, rather coarsely punctate, except along a narrow space down the middle. Scutellum subquadrate. Elytra subparallel at the base; deeply striate, the striæ feebly punctate, the interstices flat, uniseriate-punctate, the second with a double row of punctures towards the base. Beneath closely punctate, the punctures on the pro-, meso-, and metapleura coarse and confluent. Prosternum flattened, bifoveate in the anterior constriction. Anterior coxæ distant, separated by more than their own width.

Length 4-4½, breadth 1¾-1⅝ millim. (♀.)

Hab. BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Panzos (*Champion*).

Three females. More elongate than *L. calandriiformis*, the prothorax subquadrate and nearly as long as broad. Broader, less attenuate, and flatter above than the N.-American *L. nasutus**, the prosternum doubtless bispinose in the male, bifoveate near the apex in the female, as *L. calandriiformis*.

5. *Limnobaris confusa*.

? *Centrinus confusus*, Boh. in Schönh. Gen. Curc. iii. p. 740¹; Mann. Bull. Mosc. 1843, 2, p. 293². *Centrinus confusus*, Lec. Proc. Am. Phil. Soc. xv. p. 316³.

Limnobaris confusa, Casey, Ann. N. York Acad. vi. pp. 626, 637⁴.

Hab. NORTH AMERICA, Southern and Western States³, Florida^{1 3 4}, California^{1 2}.—MEXICO (*Truqui*, in *Mus. Brit.*: ♀), Teapa (*H. H. Smith*: ♂); COSTA RICA, Zent and Banana River (*Knab*, in *U.S. Nat. Mus.*: ♂ ♀); ?PANAMA (*coll. Fry*, in *Mus. Brit.*: ♂).

Three males and two females are referred to the species identified as *Centrinus confusus*, Boh.†, by Leconte and Casey. One of the males, from Teapa, with short

* *Limnobaris* (*Baridius*) *æthiops*, Kirsch, from Peru, the type of which I have seen, is nearly related to *L. nasutus*.

† Boheman describes *C. confusus* as having a "semirotondate pygidium," due probably to the abdomen being somewhat pulled out.

prosternal spines, is very like an unnamed example from New Jersey sent me by Mr. Wickham, the other, labelled as from "Panama," having very long spines, much as in a male from Florida sent me by the U.S. Nat. Museum; the female from "Mexico" has the prothorax more parallel-sided than the one from Costa Rica. They all have the upper surface finely alutaceous and rather dull, the prothorax closely and finely punctate, except along the narrow smooth median space, the vestiture sparse and very fine, and the interstitial puncturing of the elytra close, confused towards the base.

6. *Limnobaris evanescens*, sp. n.

Oblong-ovate, rather narrow, shining, black, the legs partly or entirely piccous; the punctures at the sides of the prothorax and those along the elytral interstices each bearing a minute, hair-like, whitish scale, the under surface and legs also clothed with similar scales. Head with minute scattered punctures, transversely grooved between the eyes; rostrum arcuate, about as long as the head and prothorax, in the ♂ thickened towards the base and closely punctate, in the ♀ smoother, more slender, and subcylindrical; antennal club ovate. Prothorax transverse, rounded at the sides anteriorly, narrowed and feebly constricted in front; closely, coarsely punctate, except along a narrow space down the middle. Scutellum subquadrate. Elytra a little wider than the prothorax, narrowing from about the basal third; deeply striate, the striæ feebly punctate, the interstices flat and each with a row of minute scattered punctures. Beneath closely punctate. Anterior coxæ separated by a little less than their own width.

♂. Prosternum armed with two short spines or conical tubercles, and with a very deep or shallower circular excavation between them; first ventral segment deeply excavate down the middle.

♀. Prosternum shallowly foveate in the middle in front, the intercoxal portion triangular and slightly hollowed.

Length $2\frac{1}{2}$ -3, breadth $1\frac{1}{8}$ - $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Cordova, Toxpam (*Sallé*), Orizaba (*Osborn*, in *U.S. Nat. Mus.*; *H. H. Smith*), Teapa (*H. H. Smith*); GUATEMALA, Purula, Panima, Tamahu, and Chiacam in Vera Paz (*Champion*); NICARAGUA, Chontales (*Janson*); COSTA RICA, San José (*Knab*, in *U.S. Nat. Mus.*).

Found in numbers at Purula. The minute, uniseriately-arranged, scattered punctures of the elytral interstices, the coarsely-punctate prothorax, and the shining upper surface chiefly distinguish this species. The prosternal spines vary in length, but are never very long.

7. *Limnobaris alutacea*, sp. n.

Oblong-ovate, finely alutaceous, rather dull, black, the antennæ and tarsi fusco-ferruginous; the under surface, the sides of the prothorax, and the legs somewhat thickly clothed with small, hair-like, white scales, the seriate punctures along the elytral interstices also each bearing a very minute white scale. Head transversely grooved and obsoletely foveate between the eyes; rostrum arcuate, moderately stout, about as long as the head and prothorax and somewhat thickly punctate in the ♂, a little longer, smoother, and more slender in the ♀. Prothorax much broader than long, narrowed and feebly constricted in front; coarsely, closely punctate, except along a narrow space down the middle. Elytra a little wider than the prothorax, subparallel for a short distance below the somewhat prominent humeri; punctato-sulcate, the interstices flat and conspicuously uniseriate-punctate from the base to the apex. Beneath coarsely and densely, the median portion of the ventral segments more finely and sparsely, punctate. Anterior coxæ separated by a little less than their own width.

♂. Prosternum armed with two short spines, and with a shallow excavation between them; first ventral segment excavate down the middle.

Length $3-3\frac{1}{2}$, breadth $1\frac{1}{5}-1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Mexico city (*Höge*).

Four females and one male, the latter with the apex of the abdomen somewhat dragged out and the pygidium, in consequence, visible*. Longer and duller than *L. evanescens*, the elytra more parallel-sided and with the interstices rather coarsely uniseriate-punctate, the sides of the body beneath more coarsely and more densely punctate. *L. puteifer*, Casey, from Indiana, is probably a near ally of the present insect.

8. *Limnobaris angustata*, sp. n.

Oblong-ovate, narrow, somewhat depressed above, black, with a faintly brassy lustre, the antennæ, prosternal spines, knees, and tarsi obscure ferruginous; the elytral interstices each with a dense line of rather coarse, hair-like, whitish scales, the sides of the prothorax, legs, and under surface also clothed with minute similar scales. Head transversely grooved between the eyes; rostrum about as long as the head and prothorax, curved, cylindrical, closely punctate, striate at the base, smoother and more slender in the ♀. Prothorax transverse, closely, finely punctate, except along a narrow space down the middle. Elytra deeply striate, the interstices each with a single row of minute, closely-placed punctures. Beneath closely punctate. Anterior coxæ separated by a little less than their own width.

♂. Prosternum armed with two short spines, and with a deep excavation between them; first ventral segment depressed down the middle.

Length $2\frac{3}{4}$, breadth $1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Vera Cruz (*H. H. Smith*).

One pair. Smaller and narrower than *L. confusa*, the elytra more shining and with the vestiture coarser. From the N.-American *L. concinna* (Lec.) it may be separated by its less parallel form and the more closely uniseriately-arranged vestiture of the elytra.

9. *Limnobaris dentifer*, sp. n. (Tab. XVII. figg. 35, 35 a, b, ♂.)

Oblong, flattened above, shining, piceous, the rostrum, antennæ, prosternal spines, and legs obscure ferruginous; the elytral interstices each with a line, becoming double at the base, of fine, hair-like, yellowish-white scales, the sides of the prothorax, under surface, and legs sparsely clothed with similar scales. Head closely, very finely punctate, transversely grooved between the eyes; rostrum a little longer than the head and prothorax, curved, slender, striate, and feebly punctate, the antennæ inserted behind the middle, the club ovate. Prothorax nearly as long as broad, feebly constricted and narrowed in front; closely punctate, obsoletely granulate at the sides, the disc without definite smooth median space. Scutellum trapezoidal. Elytra oblong, very little wider than the prothorax; deeply striate, the interstices minutely uniseriate-punctate and somewhat concave. Beneath closely, the inter- and post-coxal portions of the prosternum sparsely and more coarsely, punctate, the anterior portion of the latter smooth. Prosternum tumid, unimpressed, armed with two moderately long spines and dilated behind the widely-separated anterior coxæ. Legs rather stout; tibiæ widening from the base, the anterior pair (fig. 35 b) broad and

* As in Boheman's type of *Centrinus confusus*.

armed with a minute curved tooth on the lower edge towards the apex, the apical uncus almost obsolete; tarsal claws narrowly separated.

Length 3, breadth $1\frac{1}{8}$ millim. (σ .)

Hab. NICARAGUA, Chontales (*Janson*).

One male. A narrow, oblong, flattened form, with finely seriato-squamose elytra, tumid, unimpressed, bispinose prosternum, and broad tibiæ, the anterior pair armed with a minute curved tooth on the lower edge towards the apex. *L. dentifer* is of about the same size and shape as the N.-American *L. tabida*, Casey, except that the elytra are more parallel-sided. The males of various species of *Centrinites* have a somewhat similar tooth on the intermediate and posterior tibiæ, and that of *Platybaris lamellifer* a lamelliform prominence on the anterior tibiæ; but these insects are not otherwise very nearly related to *Limnobaris*.

10. *Limnobaris uniformis*, sp. n. (Tab. XVII. figg. 34, 34 a, ♀.)

Centrinus uniformis, Schm. in Mus. Brit.

Elongate-ovate, flattened above, nigro-piceous, the antennæ (the club excepted) and tarsi ferruginous; above and beneath sparsely clothed with very small, narrow, cinereous scales, the vestiture on the prothorax confined to a broad space along the sides, that on the elytra arranged in two or three close lines down each intersticio (the first with one line only). Head sparsely, very finely punctate, with a sharply-defined transverse groove between the eyes; rostrum feebly curved, very slender, about as long as the head and prothorax, punctured at the base, the antennæ inserted at about the middle, the antennal club acuminate-ovate. Prothorax a little broader than long, constricted in front, the sides rounded anteriorly; closely, finely punctate, the punctuation becoming denser at the sides and sparser on the disc. Scutellum bare, oblong. Elytra long, a little wider than the prothorax, obliquely truncate at the shoulders; sharply, narrowly striate, the interstices closely punctate. Beneath closely punctate. Prosternum foveate at the middle of the subapical groove. Anterior coxæ separated by about their own width. Tarsi with joint 3 large, the anterior pair with joint 2 strongly transverse.

Length $4\frac{1}{2}$, breadth 2 millim. (♀.)

Hab. NICARAGUA, Mosquito coast (*Mus. Brit.*).

One specimen (with the pygidium dragged out), which has stood for many years under the above-quoted MS. name in the British Museum. It has the upper portion of the mesothoracic epimera visible from above, the mandibles acutely toothed on their inner edge, the penultimate tarsal joint largely developed, and the elytral interstices closely punctate. The long, slender rostrum (♀), the transversely-grooved head, the more widely-separated anterior coxæ, the sparser vestiture of the under surface, &c., distinguish *L. uniformis* from the nearly-allied *L. T-album* (L.), of Europe. *L. rectirostris* (Lec.) is very like *L. uniformis*, but it has a more coarsely punctured prothorax, sparsely punctured elytral interstices, and scattered vestiture.

11. *Limnobaris languida*, sp. n. (Tab. XVII. figg. 36, 36 a, ♂.)

Oblong-ovate, flattened above, rufo-piceous, the antennæ and legs ferruginous; uniformly clothed with small, narrow, flavo-cinereous scales, which are arranged in two lines down each elytral interstice (the first with one line only); the vestiture of the under surface closer, fine, and whitish. Head finely punctate; rostrum arcuate, about as long as the head and prothorax, moderately stout, closely punctate, and

subcarinate in the ♂, smoother, more curved, and rather slender in the ♀, the antennæ inserted near the middle in the ♀ and at about one-third from the apex in the ♂, the outer joints of the funiculus transverse, the club ovate. Prothorax broader than long, the sides subparallel at the base and rounded from the middle forwards; closely, finely punctate, with indications of a smooth median line. Scutellum small, almost bare. Elytra a little wider than the prothorax, finely punctate-striate, the interstices rugulose punctured. Beneath closely punctate; first ventral segment obsoletely sulcate in the ♂. Prosternum unimpressed behind the deep transverse subapical groove. Anterior coxæ separated by a little less than their own width. Legs short; anterior tibiæ without visible uncus at the apex; intermediate and posterior tibiæ widened at the apex externally.

Length $2\frac{1}{2}$ – $2\frac{3}{4}$, breadth $1\frac{1}{8}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*: ♂), Toxpam (*Sallé*: ♀).

One specimen from each locality. An oblong, somewhat flattened form, with the vestiture close and rather coarse (above and beneath), the scutellum short and almost bare, the antennæ inserted beyond the middle of the rostrum in the male, the prosternum and anterior tibiæ unarmed. A species of doubtful position, but perhaps best placed in *Limnobaris*.

12. *Limnobaris bicincta*, sp. n. (Tab. XVIII. figg. 2*, 2a, ♀.)

Oblong, flattened above, moderately shining, black, the antennæ and sometimes the legs in part ferruginous; the prothorax with a posteriorly-widened vitta on each side, extending down the anterior portion of the flanks, and the elytra with two interrupted transverse fasciæ—one basal, curved, the other, oblique, at about one-third from the apex—thickly clothed with narrow pure white scales; the rostrum, under surface (a large patch on the propleura excepted), and legs rather sparsely set with small narrow white scales, these becoming coarser and denser on the metathoracic episterna. Head closely punctate; rostrum somewhat bowed from the base, moderately stout, nearly as long as the head and prothorax, striate-punctate, a little smoother at the tip in the ♀, the antennæ inserted at (♀) or just beyond (♂) the middle. Prothorax broader than long, gradually narrowing from near the base, feebly constricted in front; closely punctate, except along the median line, the interspaces alutaceous. Scutellum small, prominent. Elytra considerably wider than the prothorax, oblong, blunt at the tip, the humeri oblique and not prominent; sharply striate, the striae feebly punctate, the interstices broad and flat, obsoletely uniseriate-punctate. Beneath closely punctate; fifth ventral segment slightly hollowed down the middle in the ♂. Prosternum not or faintly depressed down the middle. Anterior coxæ separated by less than half their own width. Tibial claw arising from near the outer apical angle.

Length $2\frac{1}{8}$ – $3\frac{1}{2}$, breadth 1 – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Cordova (*Sallé*); GUATEMALA, Livingston and Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*).

Ten specimens, the two from Cordova (♀) much larger than the others. This insect has the aspect of a true *Baris*, but the pygidium is completely covered by the elytra. The markings resemble those of *L. bifasciata*. The mandibles are small, notched in their inner edge, and less decussate than in most of the species here placed under *Limnobaris*. The upper portion of the mesothoracic epimera is visible from above.

13. *Limnobaris bifasciata*, sp. n. (Tab. XVIII. figg. 3, 3a, ♀.)

Oblong-ovate, narrow, flattened above, shining, black, the legs and the tip of the rostrum piceous, the antennæ ferruginous; a streak on each side of the head between the eyes, a curved band on each side of

* The elytra are narrower and more parallel-sided than shown on the Plate.

the prothorax, two interrupted fasciæ on the elytra (one just below the base, and the other at about one-third from the apex), and the metathoracic episterna, somewhat thickly clothed with rather coarse, narrow white scales, the rest of the under surface and the legs with scattered minute white scales. Head transversely grooved between the eyes; rostrum rather slender, feebly arcuate, barely as long as the prothorax, finely punctate, smooth along the middle, the antennal club ovate. Prothorax transverse, rounded at the sides, narrowed and feebly constricted in front; sparsely punctate on the disc, densely so along the outer margin. Elytra a little wider than the prothorax, oblong; narrowly striate, the striæ distinctly punctate towards the suture, the interstices broad, flat to near the apex, the bare portions smooth. Beneath very sparsely and finely, the prosternum closely and coarsely, punctate, the latter unimpressed. Anterior coxæ separated by about their own width. Tarsi with the bilobed penultimate joint broad and joint 2 of the anterior pair strongly transverse.

Length $3\frac{1}{10}$, breadth $1\frac{1}{3}$ millim. (♀.)

Hab. PANAMA (coll. Fry, in Mus. Brit.).

One female. The albo-bifasciate elytra and the white-margined, laterally-rounded prothorax distinguish the present species. It is more shining than *L. bicincta*, the prothorax is more rounded at the sides and more sparsely punctate on the disc, the mandibles are strongly decussate, and the rostrum (♀) is slender and feebly curved.

14. *Limnobaris desidiosa*, sp. n. (Tab. XVIII. figg. 4, 4 α.)

Oblong-ovate, shining, piceous or rufo-piceous; above and beneath (the flanks of the prothorax excepted) somewhat sparsely clothed with coarse, narrow, whitish scales, which are condensed on the prothorax into a broad marginal stripe and on the elytra into a single line down each interstice. Head minutely punctate, transversely sulcate between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, rather stout, sparsely, very finely punctate, the antennæ inserted near the middle. Prothorax transverse, rounded at the sides anteriorly, feebly constricted in front; coarsely, closely punctate, except along the narrow smooth median space. Scutellum very small, smooth, triangular. Elytra gradually narrowing from the base, very little wider than the prothorax; deeply punctate-striate, the interstices about twice the width of the striæ and somewhat coarsely uniseriate-punctate. Beneath closely, coarsely punctate. Prosternum unimpressed behind the deep transverse subapical groove. Anterior coxæ separated by a little less than their own width. Tibiæ strongly unguiculate.

Length $3\frac{1}{8}$ – $3\frac{1}{2}$, breadth $1\frac{1}{4}$ – $1\frac{1}{2}$ millim. (♀?)

Hab. MEXICO, Vera Cruz (Höge).

Three specimens. The coarse vestiture, the deeply striate elytra with conspicuously uniseriate-punctate interstices, and the coarsely punctured prothorax, distinguish *L. desidiosa*. The mandibles are acutely dentate within.

15. *Limnobaris discreta*, sp. n. (Tab. XVIII. figg. 5, 5 α, ♂.)

Oblong-ovate, flattened above, shining, piceous, the legs (and in one specimen the rostrum also) ferruginous; the prothorax with a spot at the middle of the base and a marginal stripe on each side, and the elytra in part (a large, common patch on the disc below the base, and small spot on each of the humeral and subapical callosities, remaining bare), somewhat thickly clothed with oblong whitish scales; the under surface and rostrum sparsely set with similar scales. Head minutely punctate, transversely grooved between the eyes; rostrum cylindrical, arcuate, moderately stout, about as long as the head and prothorax, seriato-punctate, the antennæ inserted at (♀) or a little beyond (♂) the middle, the antennal club ovate. Prothorax broader than long, narrowed and feebly constricted in front, rounded at the sides anteriorly; closely punctate, except along a narrow space down the middle and on an oblong space towards the sides. Scutellum minute, triangular. Elytra barely twice the length of the prothorax, conjointly rounded at

the apex, depressed along the suture at the base; sharply striate, the striae feebly punctate, the interstices flat, twice as wide as the striae, uniseriate-punctate, the punctures minute or almost obsolete on the glabrous spaces. Beneath closely, the ventral segments 1-4 rather sparsely, punctate, 1 hollowed down the middle in the ♂. Prosternum unimpressed. Anterior coxae separated by less than their own width. Tibiae strongly unguiculate.

Length $2\frac{1}{2}$ - $2\frac{2}{3}$, breadth $1\frac{1}{10}$ - $1\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO, Jalapa (*Höge*: ♂); PANAMA, Tolé (*Champion*: ♀).

In this insect the elytra look as if they were rubbed on the disc, but this is not the case, the broad bare space, which extends for some distance down the suture posteriorly, being similarly shaped in the two examples obtained.

16. *Limnobaris truquii*, sp. n. (Tab. XVIII. figg. 6, 6 a, ♀.)

Oblong-ovate, flattened above, shining, piceous, the prothorax and elytra at the sides, the tip of the rostrum, antennae, and legs more or less ferruginous; the prothorax with a spot at the middle of the base and a broad marginal stripe on each side, and the elytra (a large, common, rounded patch on the anterior part of the disc excepted), somewhat thickly clothed with coarse, oblong, brownish-white scales, the under surface and legs rather sparsely clothed with narrow similarly-coloured scales. Head and rostrum as in *L. discreta*. Prothorax coarsely, densely punctate, except along the smooth median line. Scutellum squamose. Elytra deeply punctate-striate, the interstices about as wide as the striae and rather coarsely uniseriate-punctate throughout. Beneath closely punctate. Prosternum unimpressed.

Length $2\frac{3}{4}$, breadth $1\frac{1}{5}$ millim. (♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*).

One female. Near *L. discreta*, but with the vestiture much coarser, the prothorax coarsely, densely punctate (except along the median line), the scutellum squamose, the elytral interstices not wider than the striae and rather coarsely uniseriate-punctate throughout. Smaller and less elongate than *L. desidiosa*, the elytral vestiture coarser and denser at the sides, the interstices narrower.

17. *Limnobaris leucostigma*, sp. n.

Elongate, narrow, somewhat flattened above, shining, piceous, the legs fusco-ferruginous; the elytra with a small spot at the base of each interstice, and a transverse patch at the middle of the disc towards the apex, clothed with rather coarse, oblong, white scales, the sides of the prothorax, under surface, and legs more sparsely set with similar scales. Head almost smooth, transversely grooved between the eyes; rostrum curved, moderately stout, about as long as the prothorax, finely punctate, the antennae inserted at the middle, the antennal club short-ovate. Prothorax as long as broad, narrowed and feebly constricted in front, the sides rounded anteriorly and almost parallel behind; closely, uniformly punctate, except along the smooth median line. Scutellum very small, narrow. Elytra oblong-oval, very little wider than the prothorax, conjointly rounded at the apex; sharply punctate-striate, the interstices broad, flat, very finely uniseriate-punctate, all rugulose at the apex. Beneath closely punctate; first ventral segment and the base of the second excavate down the middle. Prosternum unimpressed, flattened between the anterior coxae, which are separated by rather more than their own width. Legs rather stout; tibiae strongly unguiculate, all somewhat hollowed towards the apex and pilose on their inner edge.

Length $3\frac{1}{8}$, breadth $1\frac{1}{4}$ millim. (♂.)

Hab. MEXICO, Jalapa (*Höge*).

One male, probably somewhat worn. An elongate, narrow form, with the prothorax about as long as broad and the elytra maculate with white scales across the base and at the middle of the disc towards the apex.

18. *Limnobaris manducator*, sp. n.

Elongate-ovate, somewhat convex, narrow, shining, rufescent; clothed with a few long, fine, scattered, yellowish, hair-like scales, which are clustered into a stripe along the sides of the prothorax and down the base of each of the elytral interstices. Head sparsely, very minutely punctate, with a deep transverse groove between the eyes; rostrum arcuate, nearly as long as the head and prothorax, closely, very finely punctate, smoother along the middle of the basal half, the antennæ inserted midway, the antennal club short-ovate, stout. Prothorax about as long as broad, feebly constricted in front, the sides rounded anteriorly and parallel towards the base; finely, closely punctate, except along the narrow, abbreviated, impunctate, median space. Scutellum small. Elytra oblong, scarcely wider than the prothorax, depressed along the suture below the base; finely punctate-striate, the interstices each with a row of minute scattered punctures. Beneath closely, the ventral segments 2-4 more sparsely and finely, punctate. Prosternum unimpressed behind the deep transverse subapical groove. Anterior coxæ separated by about their own width. Anterior tibiæ with a long, the others with a shorter, hook. Length $2\frac{1}{8}$, breadth $\frac{9}{10}$ millim. (σ ?)

Hab. MEXICO, Toxpan (*Sallé*).

One rather worn specimen, probably a male, though the first ventral segment is unimpressed. Smaller and smoother than *L. leucostigma*, the elytra more finely striate and immaculate beyond the middle, the vestiture much finer. The mandibles are acutely dentate within. A somewhat similar unnamed form from Brownsville, Texas, has been sent me by Mr. Wickham.

19. *Limnobaris æneola*, sp. n.

Elongate-ovate, narrow, æneous, moderately shining; sparsely clothed above and beneath with short, fine, hair-like, whitish scales, those on the elytra arranged in a single series down each interstice. Head transversely grooved between the eyes; rostrum curved, moderately stout, scarcely so long as the prothorax, and closely punctate—in the ♀ a little longer, smoother, and more slender,—the antennæ inserted at about the middle. Prothorax slightly broader than long, narrowed and feebly constricted in front; rather closely punctate, except along the median line, the interspaces finely alutaceous. Scutellum narrow. Elytra a little wider than the prothorax, oblong, conjointly rounded at the apex, depressed along the suture below the base; finely striate, the striæ becoming deeper and distinctly punctate at the apex, the interstices flat and obsolete punctulate. Beneath coarsely, the middle of the metasternum and the abdomen more sparsely and finely, punctate; metasternum at the apex and first ventral segment hollowed down the middle in the ♂. Prosternum without trace of depression. Anterior coxæ rather narrowly separated. Legs short; femora moderately stout, the tibiæ and tarsi slender; anterior tibiæ strongly unguiculate in the ♂.

Length $1\frac{3}{4}$ –2, breadth $\frac{3}{4}$ millim. (σ ♀.)

Hab. MEXICO, Motzorongo (*U.S. Nat. Mus.*: ♂), Teapa (*H. H. Smith*: ♂); GUATEMALA, Tamahu in Vera Paz (*Champion*: ♂ ♀); PANAMA, Volcan de Chiriqui (*Champion*: ♂).

Thirteen specimens, nine of which are from Vera Paz. A minute, narrow, æneous form, clothed with scattered, fine, hair-like, whitish scales, which are seriatly arranged

on the elytra, without visible pygidium in either sex. In one of the two males from Chiriqui and the one from Motzorongo the vestiture is as coarse as in *L. æraria*, but the ventral depression is similar to that of the same sex of *L. æneola*. The N.-American *L. concinna* (Lec.) is extremely like the present species, differing from it in its larger size, duller surface, and coarser vestiture.

20. *Limnobaris æraria*, sp. n.

Very like *L. æneola*, but with the vestiture longer and coarser, arranged in a close line along each elytral interstice; the rostrum slightly longer in both sexes; the elytral striae rather deeper, the first conspicuously depressed before the middle; the first ventral segment of the ♂ with a broad, shallow, closely-punctate, pilose depression.

Length 2, breadth $\frac{3}{4}$ – $\frac{5}{8}$ millim. (♂ ♀.)

Hab. SALVADOR (*coll. Solari*: ♀); NICARAGUA, Chontales (*Janson*: ♂ ♀).

Four specimens, the three females narrower than the male, but apparently all belonging to the same species. From *L. concinna* (Lec.) the present insect may be known by its narrower form.

21. *Limnobaris pygmæa*, sp. n.

Oblong-ovate, narrow, moderately shining, black, with a faint brassy lustre, almost glabrous. Head transversely grooved between the eyes; rostrum strongly arcuate, rather stout, a little longer than the prothorax, closely punctate, in the ♀ slightly longer and smoother. Prothorax transverse, rounded at the sides anteriorly, narrowed and feebly constricted in front; closely punctate, except along the median line. Elytra depressed along the suture below the base, finely striate, the striae feebly punctate, the interstices flat. Prosternum unimpressed behind the transverse subapical groove, the latter shallowly foveate in the middle in the ♂. Metasternum at the apex and first ventral segment deeply sulcate in the ♂, the anterior tibiae strongly unguiculate in this sex.

Length $1\frac{3}{4}$ –2, breadth $\frac{4}{5}$ – $\frac{7}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Teapa (*H. H. Smith*); GUATEMALA, Chiacam and Tamahu in Vera Paz (*Champion*), Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*).

Four males and four females. Darker and more convex than *L. æneola* and *L. æraria*, the surface almost bare (above and beneath), the rostrum more curved, the ventral sulcus of the male long and deep. *L. pygmæa* superficially resembles *Cerphères glabrescens* (antea, p. 256), but the latter has a conical prothorax, relatively broader elytra, a deep prosternal sulcus extending backward between the coxæ, &c. *L. (Baridius) funerea*, Kirsch, from Peru, is extremely like the present species, but it is more elongate, the prothorax is less transverse and more finely punctate, and the antennal club is longer.

22. *Limnobaris rufula*, sp. n. (Tab. XVIII. figg. 7, 7a, ♂.)

Oblong-ovate, narrow, shining, rufescent, the head and prothorax piceous; glabrous above, subglabrous beneath. Head with a few minute punctures, transversely depressed between the eyes; rostrum about as long as the head and prothorax, curved, cylindrical, rather slender, sparsely, very finely punctate, the antennæ inserted at the middle, the antennal club ovate. Prothorax transverse, narrowed and feebly

constricted in front, the sides rounded anteriorly and parallel behind; sparsely, very finely punctate, except along the median line, the punctures becoming coarser and closer at the sides. Scutellum small, subquadrate. Elytra rather long, a little wider than the prothorax, subparallel in their basal third, the apices separately rounded, the humeri somewhat swollen; sharply striate, the striæ feebly punctate, the interstices smooth and flat. Beneath sparsely punctate, the ventral segments 1-4 with a few scattered punctures only, 1 deeply sulcate, the sulcus extending backward to the middle of 2. Prosternum with a narrow, shallow sulcus. Anterior coxæ separated by a little less than their own width. Femora aparsely punctate. Anterior and intermediate tibiæ with a long, the posterior pair with a shorter, apical uncus, the uncus on the anterior pair widened towards the base.

Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♂.)

Hab. PANAMA, David (*Champion*).

One male. A small, narrow, glabrous form, with rufescent elytra and legs, the prothorax comparatively short, the elytra long and subparallel, the anterior tibiæ (♂) armed with a long hook at the apex. *L. rufula* is very like *Baridius longirostris*, Kirsch, from Peru, but the latter has a fully-exposed pygidium, relatively broader elytra, &c.

23. *Limnobaris cylindriclava*, sp. n. (Tab. XVIII. figg. 8, 8a, ♂.)

Oblong-rhomboidal, narrow, flattened above, rather dull, black; the upper surface glabrous, the under surface and legs with minute, narrow, scattered whitish scales. Head aparsely, finely punctate, foveate between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, stout, compressed, finely punctate, the antennæ inserted at the middle, the antennal club cylindrical and greatly elongated, solid, and fully twice the length of the funiculus, joints 3-7 of the latter transverse and closely articulated. Prothorax nearly as long as broad, gradually narrowing from the base, constricted in front; closely, coarsely punctate, except along a narrow median space, the interspaces very finely alutaceous. Scutellum small, transverse. Elytra subtriangular, slightly depressed along the suture; sharply punctate-striate, the interstices flat, alutaceous, and finely uniseriate-punctate. Beneath coarsely, the ventral segments more finely, punctate. Prosternum broadly and very shallowly sulcate, the transverse subapical groove bifoveolate in the middle, and also foveate on each side of this. Anterior coxæ separated by a little less than their own width.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim. (♂.)

Hab. PANAMA, David (*Champion*).

One specimen. This is one of the few Barids known to me with the antennal club nearly as long as the scape and funiculus united, and it will probably have to be separated from *Limnobaris*. *Geræus longiclava* also has a very elongate antennal club in the male; but in that insect the mandibles are straight and pointed, instead of being strongly decussate.

LIMNOBAROIDES, gen. nov.

Rostrum arcuate, moderately long; mandibles rounded externally, notched within, slightly decussate at the tip; antennal club ovate; prothorax feebly constricted in front; scutellum free, subquadrate; elytra very little wider than the prothorax, somewhat triangular, the humeri broadly rounded, leaving the upper part of the mesothoracic epimera exposed from above; pygidium fully exposed, subvertical, and divided by a transverse suture in ♂ (fig. 9b), gradually sloping and entire in ♀ (fig. 10); prosternum excavate and usually armed with two long spines in ♂, unimpressed in ♀; fifth ventral segment truncate at the apex in ♂, rounded in ♀; anterior coxæ widely separated; femora clavate, unarmed; tarsal claws long, divergent; body ovate or elliptic, flattened above, sparsely squamose.

Type, *L. exposita*.

The three closely-allied species referred to this genus are nearly related to *Limnobaris calandriiformis* and other Tropical-American forms with widely-separated anterior coxæ and bispinose prosternum in the male, from which they differ in having the pygidium completely exposed in both sexes, and apparently bisegmentate in the male. *Limnobaroides*, therefore, is one of those genera with the prosternal structure of the typical "Centrinides" and the exposed pygidium of the "Baridiides vrais." *L. exposita* appears to be a common insect in the "tierra caliente" of Central America.

1. *Limnobaroides exposita*, sp. n. (Tab. XVIII. figg. 9, 9 a, b, ♂; 10, ♀.)

Ovate, flattened above, shining, black, the base of the antennæ, apical half of the rostrum, and the legs often more or less ferruginous; sparsely clothed with small, setiform, flavo-cinereous or cinereous scales (which are usually condensed along the sides of the prothorax and wanting on the disc), the vestiture of the elytra sometimes blackish, except at the base and along the suture, that of the under surface entirely cinereous. Head closely punctate; rostrum moderately stout, as long as the head and prothorax, arcuate, closely punctate, in the ♀ with the apical half much smoother and more slender, the antennæ inserted at (♂) or a little behind (♀) the middle. Prothorax broader than long, rounded at the sides anteriorly, narrowed and feebly constricted in front, closely, coarsely punctate, except along the smooth median line. Scutellum transverse. Elytra rounded-triangular, rather short, depressed along the suture; deeply striate, the striæ feebly punctate, the interstices flat and rather coarsely uniseriate-punctate. Pygidium densely punctate. Prosternum in fully-developed examples armed with two slender spines, and with a deep fovea in front of them, in the ♂, flattened in the ♀. Anterior coxæ separated by rather more than their own width. Ventral segments 1 and 2 flattened down the middle, and 5 truncate at the apex, in the ♂.

Length $2\frac{1}{3}$ – $3\frac{1}{5}$, breadth 1 – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Motzorongo in Vera Cruz (*Osborn, in U.S. Nat. Mus.*), Temax in N. Yucatan (*Gaumer*); BRITISH HONDURAS (*Blancaneaux*); GUATEMALA, Panzos (*Champion, Conradt*); SALVADOR, Sonsonate and Izaleco (*Knab, in U.S. Nat. Mus.*); NICARAGUA, Managua (*Solari*); COSTA RICA, San Carlos, Puerto Limon (*U.S. Nat. Mus.*); PANAMA, Tabernilla, Canal Zone (*Busck, in U.S. Nat. Mus.*).

Numerous examples, varying in the colour of the legs and rostrum, and in the greater or less predominance of the cinereous setiform scales on the elytra, these being sometimes wholly of that colour. The prothorax is more coarsely punctate than in the allied forms. In two of the males (one with the penis extruded) the prosternal spines are entirely obsolete.

2. *Limnobaroides plana*, sp. n.

Oblong-elliptic, flattened above, shining, black; sparsely clothed with setiform cinereous scales, which on the elytral interstices are intermixed with minute darker scales. Head transversely depressed between the eyes, minutely punctate; rostrum strongly arcuate, long and slender, thickened and closely punctate at the base, for the rest very finely punctate, the antennæ inserted at about the basal third. Prothorax broader than long, rounded at the sides anteriorly, narrowed and constricted in front; sparsely punctate, except along a narrow median space, the punctuation becoming coarser and closer towards the sides. Scutellum transverse. Elytra deeply punctate-striate, the interstices flat and uniseriate-punctate. Pygidium sloping, densely, rugosely punctate. Beneath closely punctate. Prosternum unimpressed, foreolate between the anterior coxæ, which are separated by a little more than their own width.

Length $3\frac{2}{3}$, breadth $1\frac{2}{3}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One female. Larger, more flattened above, and a little more elongate than *L. exposita*, the prothorax sparsely and more finely punctate on the disc, the rostrum (♀) longer, smoother, and more slender, the antennæ inserted nearer to its base. The setiform cinereous scales on the elytra are arranged in a scattered series down each interstice. From *Limnobaris calandriiformis*, &c., the present species may be readily distinguished by the long, completely exposed pygidium.

3. *Limnobaroides flavolimbata*, sp. n. (Tab. XVIII. figg. 11, 11a, ♂.)

Elliptic, flattened above, shining, piceous, the rostrum, prothorax, femora, and tibiæ rufescent, the prosternal spines testaceous; the sides of the prothorax and the under surface thickly clothed with rather coarse, hair-like, ochreous scales, the elytra with scattered similar scales intermixed with darker ones along each interstice (the ochreous scales predominating at the base), the legs sparsely set with fine hair-like yellow scales. Head thickly punctate; rostrum moderately stout, strongly arcuate, longer than the head and prothorax, closely and deeply striato-punctate, rugose at the sides towards the base, the antennæ inserted at the middle. Prothorax broader than long, rounded at the sides anteriorly, narrowed and constricted in front; closely, rather coarsely punctate, except along a narrow smooth space down the middle. Scutellum trapezoidal, smooth. Elytra rounded-triangular, a little wider than, and less than twice the length of, the prothorax, depressed along the suture anteriorly; narrowly punctate-striate, the interstices flat and rather closely uniseriate-punctate. Pygidium subvertical, densely punctate, and with a transverse suture. Beneath closely punctate; first ventral segment broadly depressed down the middle, the fifth truncate at the apex. Prosternum armed with two long spines, and with a broad, deep, smooth excavation extending forward to the apex. Anterior coxæ separated by rather more than their own width.

Length $3\frac{1}{2}$, breadth $1\frac{3}{8}$ millim. (♂.)

Hab. GUATEMALA, Pantaleon, Pacific slope, 1700 feet (*Champion*).

One specimen, in very fresh condition. Easily recognizable by the rather coarse, close ochreous vestiture of the under surface and of the sides of the prothorax. The rostrum is stouter, longer, and more strongly arcuate than in the same sex of *L. exposita*.

PSEUDORTHORIS, gen. nov.

Rostrum arcuate, rather slender, moderately long; mandibles short, rounded externally, slightly notched within, decussate; antennal club small, ovate, pubescent; prothorax transverse, moderately constricted in front; scutellum small, free; elytra wider than the prothorax, oblong-subtriangular; pygidium long and projecting, gradually sloping to the tip and entire in both sexes (fig. 12b); prosternum unarmed, shallowly sulcate; anterior coxæ narrowly separated; tarsal claws free; body oblong-rhomboidal, squamose.

Type, *Ps. deveaus*.

The single species placed in this genus seems to be nearest related to the N.-American *Orthoris** and *Rhoptobaris*, Lec., from which it differs in the distinctly sulcate prosternum, the small antennal club, the subtriangular elytra, the squamiform vestiture, &c. The unarmed, shallowly sulcate prosternum and the narrowly separated anterior coxæ separate *Pseudorthoris* from *Limnobaroides*, which also has a protuberant pygidium in both sexes†. The present genus may be treated as an osculant form,

* The two members of this genus are said by Pierce to attack different species of *Mentzelia* (Ent. News, 1907, p. 381).

† *Baris scolopacea*, Germ., a Palearctic insect that has been introduced into North America, also approaches *Pseudorthoris*; it cannot be included in *Baris* as restricted by Casey.

having the general facies of a Centrinid, with the fully-exposed pygidium of the "Baridiides vrais."

1. *Pseudorthoris devexus*, sp. n. (Tab. XVIII. figg. 12, 12 a, b, ♀.)

Narrow, somewhat flattened above, black or piceous, the antennæ obscure ferruginous; clothed with very small, narrow, white and brownish scales, the white scales condensed into a faint median line and a small spot at each hind angle of the prothorax and a spot on the scutellum, the elytra also with larger white scales intermixed with the others, which are arranged in one or two lines along each interstice; the entire under surface closely albo-squamosa. Head very finely punctate, faintly foveate between the eyes; rostrum arcuate, thickened towards the base, closely punctate, not longer than the head and prothorax in the ♂, the apical portion longer and smoother in the ♀, the antennæ inserted considerably behind the middle in the ♂ and at the basal third in the ♀. Prothorax transverse, densely, finely punctate. Elytra gradually narrowing from the base, narrowly striate, the interstices much wider than the striae and closely, rugulose punctate. Beneath densely punctate. Prosternal groove almost hidden by the vestiture. Legs rather slender.

Length $2\frac{1}{4}$ – $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*), Teapa (*H. H. Smith*).

Four males and three females.

ORTHOMERINUS, gen. nov.

Rostrum curved, as long as the elytra, abruptly separated from the head, the scrobes becoming confluent at some distance from the base beneath; mandibles short, decussate, notched within; head small; antennal club ovate, the scape not nearly reaching the eyes; prothorax conical, deeply sinuate at the base, tubulate in front; scutellum small, transverse, free; elytra triangular, with the obliquely truncated humeri almost in a line with the sides of the prothorax; pygidium not visible; prosternum unarmed, the anterior portion long, flattened, and declivous, the posterior portion developed into a large, transverse, flattened protuberance, which is abruptly declivous in front, and sharply bifurcate and completely covering the mesosternum behind; anterior coxæ separated by fully their own width; femora linear, unarmed; tarsal claws subconnate at the base; body rhomboidal, flattened above, coarsely sculptured, clothed with fine scattered vestiture.

Type, *O. pittieri*.

This genus may be known by the extraordinary development of the posterior portion of the prosternum, the small head, linear, unarmed femora, &c. *Orthomerinus* affords a sort of connecting-link with the "Madarides," the prosternal process being greatly developed and covering the mesosternum behind; the pygidium, however, is not visible.

1. *Orthomerinus* * *pittieri*, sp. n. (Tab. XVIII. figg. 13, 13 a, ♂.)

Shining, black, with a faint brassy lustre; sparsely clothed with minute hair-like scales, those on the under surface and legs whitish, the others darker and inconspicuous. Head closely punctate, transversely grooved between the eyes; rostrum rather stout and compressed, abruptly excavate on each side at the base beneath, tapering towards the tip, coarsely punctate, the antennæ inserted behind the middle. Prothorax slightly broader than long, conical, constricted in front, the sides a little rounded towards the base; coarsely, closely punctate, the interspaces at the sides obliquely rugose. Elytra narrowly, deeply striate, the interspaces broad, transversely rugose, the outer ones feebly convex. Beneath coarsely, closely

* Since Plate XVIII. was printed, the name *Orthomerus* has been found to be preoccupied in Reptilia, hence the change.

punctate, the prosternum transversely rugose, the subapical groove foveolate; first ventral segment broadly excavate.

Length 6, breadth 3 millim. (♂.)

Hab. COSTA RICA, Guanacaste (*Pittier*).

One specimen, found in June 1890.

PSEUDORTHOMERINUS, gen. nov.

Rostrum long, strongly arcuate; mandibles short, decussate; antennal club ovate; prothorax conical, tubulate in front; scutellum very small, rounded, free; elytra triangular, with the obliquely truncated humeri almost in a line with the sides of the prothorax; pygidium not visible; prosternum unarmed, declivous, the basal process subquadrate, flattened, partly covering the mesosternum; anterior coxæ very narrowly separated in the ♂, a little more distant in the ♀; legs moderately elongate; femora unarmed, clavate, the anterior pair very stout in the ♂, the intermediate and posterior pairs sulcate along their outer half beneath; tarsal claws subconnate at the base; body rhomboidal, flattened above, coarsely sculptured, clothed with a fine scattered vestiture beneath.

Type, *Ps. consanguineus*.

The species from which the above characters are taken is nearly allied to *Orthomerinus pittieri*, but differs from it in the non-protuberant prosternum, the clavate, sulcate femora, &c., the two insects being in other respects very much alike. *Pseudorthomerinus* has the compact form of *Pachybaris porosa*, Lec., but it is less convex beneath, the limbs are longer, the anterior coxæ are narrowly separated, the scutellum is small, the body rhomboidal, &c.

1. *Pseudorthomerinus consanguineus*, sp. n. (Tab. XVIII. figg. 14, 14 a, ♂.)

Shining, nigro-piceous or black, with a faint brassy lustre; almost glabrous above, the punctures on the under surface and legs each bearing a minute, whitish, hair-like scale, the ante-coxal portion of the prosternum (♂) thickly clothed with narrow ochraceous scales. Head minutely punctate, transversely grooved between the eyes; rostrum a little longer than the elytra, stout, striate-punctate, smooth along the middle, in the ♀ more slender and more elongate, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax broader than long, narrowing from the base, the sides slightly rounded anteriorly; coarsely, closely punctate. Elytra deeply, narrowly punctate-striate, the interstices broad, closely punctate, becoming asperate towards the sides and apex. Beneath closely, the ventral segments 2-4 very sparsely, punctate, 5 transversely depressed in the middle behind in the ♂. Tibiæ strongly unguiculate.

Length $3\frac{7}{8}$ -4, breadth $2-2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente (*Sallé*: ♀); GUATEMALA, Mirandilla, Pacific slope (*Champion*: ♂).

Two males and one female, evidently belonging to the same species, the female abraded beneath. The elytra are triangular, and more attenuate at the apex than shown in our (fore-shortened) figure.

GANYMELA.

Ganymela, Pascoe, Ann. & Mag. Nat. Hist. (5) xvii. p. 427 (1886).

A genus based upon a single species from Panama, remarkable amongst the Barids on account of the serrate femora. The pygidium is not visible, and the anterior coxæ are narrowly separated.

1. *Ganymela nitida*.

Ganymela nitida, Pasc. Ann. & Mag. Nat. Hist. (5) xvii. p. 427¹.

Hab. PANAMA¹.

An oblong, robust form, with a subquadrate prothorax, and uneven, oblong elytra. The unique type is a male, and it has the first ventral segment broadly excavate in the middle. The locality seems to require confirmation.

Sect. EUTOXIDES.

Madarides vrais, Lacordaire (part.).

Under this section are included the "Madarids" with the pygidium covered by the elytra in both sexes—*Conoproctus*, *Madarus*, and *Dactylocrepis* having the pygidium fully exposed,—the Eutoxides bearing much the same relation to the Madarides as do the Centrinides to the Barides. The typical genus *Eutoxus* is remarkable on account of having the rostrum sometimes greatly elongated in the male, as in *Madarus 4-pustulatus*, F.*. *Calandromimus* is a peculiar flattened form with the under surface very broadly excavate and more or less squamose down the middle in both sexes.

EUTOXUS.

Eutoxus, Schönherr, Gen. Cure. viii. 1, p. 103 (1844); Lacordaire, Gen. Col. vii. p. 254.

A genus including a few conspicuous Tropical-American forms, four of which occur in our region. They may be separated thus:—

Rostrum in ♂ straightened towards the base, and often very elongate in this sex,
arcuate in ♀.

Prosternum bispinose near the apex in ♂; elytra foveate near apex *foveatus*.

Prosternum unarmed in ♂; propleura transversely tumid opposite the coxæ;
elytra not foveate *lacordairei*.

Rostrum arcuate in both sexes, not greatly elongated in ♂.

Elytra deeply excavate at base *plicatilis*.

Elytra slightly depressed at base *fraternus*.

1. *Eutoxus foveatus*, sp. n. (Tab. XVIII. figg. 15, 15 a, b, ♂; 16, ♀.)

Elongate, subfusiform, robust, nigro-piceous or black, shining; glabrous above, the punctures of the under surface and legs each bearing a minute whitish scale. Head closely punctate, transversely depressed between the eyes; rostrum (♂) almost straight in its basal half and curved thence to the apex, moderately stout, longer than the body, somewhat closely punctate, (♀) curved from the base, a little stouter, and scarcely longer than the elytra, the antennæ inserted at about the basal third, the scape not reaching the eyes in the ♂, the club small, acuminate-ovate. Prothorax subconical, longer than broad in the ♂, shorter in the ♀, constricted just before the apex, the sides becoming subparallel towards the deeply sinuate base, the median lobe long, rounded, and impinging on the scutellum; closely, finely punctate. Elytra elongate-triangular, transversely depressed at the base and deeply foveate on the disc near the apex; finely punctate-striate, the punctures oblong, the interstices sparsely, minutely punctate, flat,

* Incorrectly treated as synonymous with *Conoproctus 4-plagiatus*, Lac., by Gemminger and Harold.

somewhat raised at the apex. Beneath sparsely punctate; first ventral segment deeply sulcate, and the fifth densely punctate and fulvo-pilose, in the ♂. Prosternum in the ♂ becoming tumid in the middle anteriorly and there armed on each side with an outwardly-projecting, smooth, conical tubercle, arcuate-emarginate at the base. Anterior tibiae ciliate within in both sexes, densely so, and also feebly serrate, in the ♂. Tarsi hairy and with large penultimate joint in both sexes.

Length $11\frac{1}{3}$ – $12\frac{1}{3}$, breadth $4\frac{1}{2}$ – $4\frac{2}{3}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One male and two females. This insect agrees very nearly with Lacordaire's amplified description of *E. reflexus*, Boh., from Brazil; but the male differs from a specimen of that insect before me in having the rostrum stouter, the prothorax more elongate and more gradually narrowed forwards, the elytra deeply foveate near the apex and with the interstices flat for about four-fifths of their length and the punctures in the striae oblong in shape, and the fifth ventral segment densely pilose.

2. *Eutoxus lacordairei*, sp. n. (Tab. XVIII. figg. 17, 17 a, ♂; 18, ♀.)

Somewhat fusiform, shining, nigro-piceous or black, almost glabrous. Head small, closely punctate, transversely depressed between the eyes; rostrum (♂) nearly as long as, or fully two-thirds the length of, the body, moderately stout, thickened, almost straight, and coarsely punctate in its basal third, the outer portion arcuate and more sparsely punctured, (♀) arcuate from the base and as long as in the smaller males, the antennae inserted behind the middle, the scape in the ♂ not nearly reaching the eyes. Prothorax about as long as broad, the sides parallel for about their basal third and then abruptly and obliquely convergent to the narrow apex, feebly constricted in front, the median basal lobe long and nearly covering the scutellum; finely, somewhat closely punctate. Elytra triangular, transversely excavate at the base; finely punctate-striate, the interstices flat, convex at the apex, with very minute scattered punctures, which are uniseriately arranged towards the sides. Beneath closely punctate laterally, sparsely and more finely so down the middle; first ventral segment flattened along the centre. Prosternum rather convex, unimpressed behind the foveolate, transverse subapical groove. Propleura transversely tumid and subcostate opposite the very widely-separated coxae. Anterior tibiae densely ciliate and crenulate within in the ♂, sparsely ciliate in the ♀.

Length $5\frac{1}{2}$ – $7\frac{1}{3}$, breadth $2\frac{1}{5}$ –3 millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui, Bugaba (*Champion*).

Three males and one female. Smaller and less elongate than *E. foveatus*, the propleura transversely swollen opposite the anterior coxae, the prothorax abruptly and obliquely narrowed from the parallel-sided basal portion, the elytra not foveate near the apex. The rostrum of the male varies in length, and it is sometimes not longer than in the female.

3. *Eutoxus plicatilis*, sp. n. (Tab. XVIII. figg. 19, 19 a, ♂.)

Somewhat fusiform, castaneous, shining, glabrous. Head small, finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, moderately stout, thickened towards the base, in the ♂ more than half the length of the body and sparsely punctate, in the ♀ a little shorter and stouter, more coarsely punctate, and somewhat gibbous at the base, the antennae inserted far behind the middle, the scape not reaching the eyes in the ♂, the club acuminate-ovate, small. Prothorax a little broader than long, conical, constricted in front, the sides becoming subparallel at the base, the base itself deeply sinuate and with a long median lobe; very sparsely, minutely punctate. Elytra subtriangular, the humeri rounded and

somewhat swollen, the disc transversely hollowed at the base; finely punctate-striate, the interstices flat, becoming convex at the apex, each with a scattered row of very minute punctures. Beneath very sparsely, finely punctate; first ventral segment excavate down the middle in the ♂. Prosternum tumid between the coxæ in both sexes, unimpressed anteriorly, the transverse subapical groove longitudinally foveolate. Legs slender, the femora abruptly clavate; anterior tibiæ serrate and closely ciliate within in the ♂, sparsely ciliate in the ♀; anterior tarsi somewhat hairy in both sexes.

Length $5-5\frac{1}{4}$, breadth $2\frac{1}{5}-2\frac{2}{5}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Belt*).

One pair. Smoother than *E. lacordairei*, the rostrum more slender and strongly arcuate in both sexes, the prosternum more swollen between the coxæ, the propleura not plicate, the anterior tibiæ of the male serrate and more sparsely ciliate, the body entirely castaneous.

4. *Eutoxus fraternus*, sp. n. (Tab. XVIII. figg. 20, 20 a, ♂.)

Subfusiform, robust, shining, faintly alutaceous, black, glabrous. Head closely punctate, transversely grooved between the eyes; rostrum arcuate, moderately stout, a little more than half the length of the body, slightly thickened at the base, closely punctate, the antennæ inserted at about the basal third. Prothorax nearly as long as broad, subconical, rapidly and arcuately narrowing from about the basal third, the short tubulate apical portion separated by a distinct ridge, the median basal lobe long; closely, finely punctate. Elytra triangular, moderately long, transversely depressed on the disc at the base; finely punctate-striate, the interstices flat, convex at the apex, sparsely, very minutely punctate. Beneath sparsely punctate; first ventral segment depressed down the middle, the fifth with a deep transverse fovea at the apex. Prosternum unimpressed, flattened between the very widely-separated anterior coxæ. Anterior tibiæ sparsely ciliate within. Third tarsal joint moderately large.

Length $7\frac{2}{5}$, breadth $3\frac{1}{5}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

One male. Smaller and less elongate than the same sex of *E. foveatus*, with a comparatively slender, arcuate, much shorter rostrum, the legs shorter, the tarsi less dilated, the elytra without subapical fovea, the fifth ventral segment deeply foveate. More robust and less shining than *E. lacordairei*, the prothorax more rounded at the sides, and with a sharply-defined "neck" in front, the elytra less excavate at the base, &c. The male-characters are less pronounced than in the allied forms, and the insect described at first sight appears to be a female.

PSEUDEUTOXUS, gen. nov.

Rostrum very slender, flattened, arcuate and much longer than the body in the ♀, feebly curved and about as long as the elytra in the ♂, the scrobes lateral and very shallow, the antennæ inserted at about the middle in the ♂ and at the basal third in the ♀, the scape not reaching the eyes, the joints of the funiculus obconic, the club acuminate-ovate; mandibles abruptly dilated at the base externally in the ♀, obsoletely so in the ♂, the basal portion in the ♀ crescentiform above (fig. 22 a)*; prothorax abruptly tubulate in front and with the basal median lobe short; scutellum free, small, transverse, emarginate behind; elytra oblong-triangular; pygidium not visible; prosternum unimpressed anteriorly, the broad

* The crescentiform piece (of which there is no trace in the ♂), at first sight, appears to be attached to the apex of the rostrum; but, so far as I can ascertain without dissection, it is really part of the mandible.

basal portion moderately developed and almost covering the flattened mesosternum; anterior coxæ separated by about their own width in the ♂, more distant in the ♀; legs long and slender; femora clavate; body elongate-rhomboidal, polished, almost glabrous above, the tibiæ and tarsi more or less pileose.

Type, *Ps. filirostris*.

This genus includes a single species from Costa Rica, with remarkable sexual distinctions. The very slender, long, flattened rostrum, with shallow, laterally-placed scrobes, the peculiarly-formed mandibles of the female, the short basal lobe of the prothorax, and the free scutellum, separate *Pseudeutoxus* at once from *Eutoxus*. In the present genus, too, the female has an extremely elongate rostrum, it being more than twice as long as in the male—a character to be found in various *Balanini*.

1. *Pseudeutoxus filirostris*, sp. n. (Tab. XVIII. figg. 21, 21 a, ♂; 22, 22 a, ♀.)

Shining, black; clothed with scattered, fine, golden hairs beneath, these being long and conspicuous on the under side and flanks of the prothorax. Head finely punctate, foveate and transversely grooved between the eyes; rostrum shallowly grooved down the middle and finely punctate in the ♂, smooth and unimpressed in the ♀. Prothorax transverse, arcuately narrowing from the base to the narrow anterior lobe; closely, finely punctate. Elytra wider than the prothorax, rapidly narrowing from the base; flattened anteriorly, each with a deep, oblique, foveiform depression on the disc at one-third from the apex; sharply striate, the striæ obsoletely punctate, the interstices almost smooth, flat, the second depressed along the short apical declivity. Beneath very sparsely, finely punctate; intercoxal portion of the prosternum tumid in the middle in the ♀, hollowed in the ♂; first ventral segment very broadly excavate, and the fifth with a transverse densely pilose depression, in the ♂. Anterior tibiæ sinuous, dilated in their apical two-fifths, and unarmed at the apex in the ♂, gradually widened to the apex and with a long terminal claw in the ♀. Anterior tarsi with long projecting hairs in the ♂.

Length $5\frac{1}{2}$ –7, breadth $2\frac{1}{5}$ –3 millim. (♂ ♀.)

Hab. COSTA RICA, Rio Sucio and Irazu (*Rogers*).

One female and two males.

CALANDROMIMUS, gen. nov.

Rostrum flattened, feebly curved, very little longer than the head and prothorax, the acrobes rapidly descending, becoming shallow and coalescent beneath, the antennæ inserted slightly beyond the middle, the antennal club small, ovate; mandibles blunt and slightly decussate at the tip; head small; eyes large, transverse; prothorax with a short, abrupt neck in front, the basal lobe truncate; scutellum large, free, flat, transversely subquadrate; elytra oblong-triangular, wider than the prothorax, sharply striate; pygidium not visible; pro-, meso-, and metasternum and abdomen broadly excavate or flattened down the middle for their entire length; prosternum with a fine arcuate groove between the widely-separated, exerted anterior coxæ, the broad basal process shallowly arcuate-emarginate behind and on the same plane as the flattened intercoxal portion of the mesosternum; mesothoracic epimera broad and ascending, the upper portion visible from above; metasternum with a narrow median sulcus; ventral segments 1 and 2 connate in the middle; femora unarmed, curved, compressed, strongly clavate, the anterior pair very stout; tibiæ somewhat curved, flattened, acutely produced at the inner apical angle in the ♂; tarsi comparatively slender, the claws free; body elongate-elliptic, broad, flattened above and beneath, sparsely squamose.

Type, *C. caviventris*.

The single species from Panama, represented by two specimens (evidently ♂ and ♀),

from which the above diagnosis is taken, has the general facies of a Calandrid; with the elytra marked as *Madarus bilineatus*. The only insect known to me at all resembling it is the eastern genus *Plaxes*, Pasc. *Calandromimus*, to the best of my recollection, was found under the sappy bark of a fallen tree.

1. *Calandromimus caviventris*, sp. n. (Tab. XVIII. figg. 23, 23 *a*, *b*, ♂.)

Black or nigro-piceous, the extreme base of the antennæ rufous, the surface moderately shining; the elytra with a dense line of imbricate narrow ochreous scales running down the third interstice to a little beyond the middle, the rest of the elytral interstices thickly clothed with very small, oval fuscous scales, the prothorax with a small patch of hair-like ochreous scales at the base on each side; the punctures in the hollowed median portion of the under surface each bearing a small, hair-like, ochreous scale, and the excavated space itself bordered on each side with a dense matted fringe of longer and coarser, hair-like, similarly-coloured scales; the tibiæ pilose within. Head closely, minutely punctate, transversely sulcate between the eyes; rostrum moderately stout, closely, finely punctate. Prothorax broader than long, the sides rounded and gradually converging to the short neck-like constriction; closely, finely punctate, except along the median line. Elytra with rather broad obsolete punctate striæ, the interstices densely, finely punctate and with a smooth line on each side. Beneath shining, very closely and finely, the abdomen sparsely, punctate, the sides of the metasternum with coarse, scattered punctures; ventral segments 1 and 2 broadly hollowed, and 3 and 4 flattened, down the middle, 5 also excavate in the ♂. Femora closely, finely punctate. Anterior tibiæ hollowed and clothed with short hairs on the inner side towards the apex.

Length $6\frac{1}{2}$, breadth $2\frac{3}{4}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One pair, the specimen assumed to be the male having the anterior tibiæ acutely produced at the inner apical angle and the fifth ventral segment excavate.

Sect. MADARIDES.

Madarides vrais, Lacordaire (part.).

Under this section are included the "Madarids" with fully exposed pygidium. They all have the basal portion of the prosternum greatly developed and nearly or quite covering the mesosternum. *Ampelogypter* would perhaps be almost equally well placed near *Onychobaris* in the "Baridiides vrais."

MADARUS.

Madarus, Schönherr, Disp. Meth. p. 273 (1826); Gen. Curc. iii. p. 636, viii. 1, p. 105; Lacordaire, Gen. Col. vii. p. 256.

This genus, after excluding *Madarellus*, includes numerous Tropical American forms, and will doubtfully have to be further divided. I follow Lacordaire in placing the species under two groups—one with the upper surface completely bare, and the other with patches of scales on the prothorax and elytra. The prosternum may be unimpressed, bifoveate or sulcate, and is sometimes tumid between the coxæ in the males (*M. tumefactus*), or deeply emarginate at the base (*M. corvinus*, &c.). The rostrum is elongated and hairy in the male of *M. quadripustulatus*, and the anterior tarsi are

occasionally (as in the Colombian *M. velatipes* and *M. tarsalis*, Kirsch) very hairy in this sex. The tothing of the femora, or at least of the anterior pair, is often a variable character, and more or less corresponds with the greater or less sulcature of their lower surface. The elytra are uneven in many of the smaller glabrous forms.

a. Prothorax and elytra glabrous.

- a*¹. Basal process of the prosternum angularly emarginate behind; elytra obsoletely striate-punctate or almost smooth; femora clavate, unarmed (the anterior pair sometimes obsoletely dentate), not sulcate; body black.
- a*². Rostrum of ♂ longer than in ♀, ciliate beneath; antennal club elongate; prosternum unimpressed in front; elytra spotted Species 1.
- b*². Rostrum of ♂ not longer than in ♀, bare; antennal club acuminate-ovate or ovate; elytra immaculate.
- a*³. Prosternum with a single deep fovea in front; prothorax with a long basal lobe Species 2, 3.
- b*³. Prosternum bifoveate or unimpressed in front; prothorax with less produced basal lobe Species 4.
- b*¹. Basal process of the prosternum feebly notched, arcuate-emarginate, or truncate behind.
- c*². Prosternum bifoveate or unimpressed in front; elytra obsoletely or faintly striate; body black.
- c*³. Anterior femora feebly dentate, the others obsoletely sulcate . . . Species 5, 6.
- d*³. Anterior femora unarmed.
- a*⁴. Femora not sulcate, clavate Species 7.
- b*⁴. Femora (the anterior pair excepted) sulcate, linear or clavate . . . Species 8, 9.
- d*². Prosternum broadly and shallowly sulcate anteriorly; femora unarmed, sulcate; elytra uneven, obsoletely striate on the disc; body metallic . . . Species 10.
- e*². Prosternum deeply sulcate to between the coxæ; femora obsoletely dentate or unarmed, more or less sulcate; body black.
- e*³. Elytra obsoletely striate on the disc Species 11, 12.
- f*³. Elytra distinctly striate Species 13, 14.

b. Prothorax and elytra with patches of scales; basal process of the prosternum feebly emarginate or truncate behind.

- c*¹. Prosternum bifoveate or not in front; elytra striate.
- f*². Femora, or at least the anterior pair, usually with a small tooth, more or less sulcate.
- g*³. Elytra with an oblong or oval patch of scales at the base of the 3rd interstice Species 15-18.
- h*³. Elytra with a short narrow line of scales at the base of the 3rd interstice Species 19.
- i*³. Elytra with an elongate line of scales running down the 3rd interstice. Species 20, 21.
- j*³. Elytra with irregular confluent lines of scales, femoral tooth distinct . . . Species 22.
- y*³. Femora unarmed, linear, shallowly sulcate; elytra mottled and sub-bifasciate Species 23.

- d'. Prosternum bisulcate; intermediate and posterior femora obsoletely sulcate.
- h². Anterior femora feebly dentate; elytra with the striæ obliterated on the disc Species 24.
- i². Anterior femora unarmed; elytra striate throughout Species 25.

1. **Madarus quadripustulatus.** (Tab. XVIII. figg. 24, 24 a, ♂; 25, ♀.)

Calandra quadripustulata, Fabr. Syst. Eleuth. ii. p. 435¹.

♀. *Madarus quadripustulatus*, Boh. in Schönh. Gen. Cure. viii. 1, p. 105².

♂. Rostrum (fig. 24 a) elongate, abruptly bowed at the apical third, with a dense fringe of long fulvous hairs along each edge beneath, the antennæ inserted far beyond the middle; prosternum with a stout, flattened, anteriorly bifurcate process between the coxæ; anterior tarsi dilated and hairy; anterior tibiæ hairy along their inner edge; first ventral segment depressed, and clothed with a few hair-like scales, down the middle, the fifth truncate at the apex; pygidium transverse and narrowly visible from beneath.

♀. Rostrum (fig. 25) much shorter, strongly arcuate from the base, the antennæ inserted at about the middle; pygidium longer and less convex, scarcely visible from beneath.

Hab. GUATEMALA, Yzabal (*Sallé*: ♂); NICARAGUA, Chontales (*Belt*: ♀); PANAMA, Volcan de Chiriqui (*Champion*: ♀).—SOUTH AMERICA^{1 2}.

We possess three specimens of this widely-distributed insect from Central America. The male has not previously been described. The antennal club is elongate, the prosternum is without apical fovea, and its basal process is emarginate behind, in both sexes. *M. quadripustulatus* is incorrectly treated in the 'Munich Catalogue' (p. 2638) as synonymous with *Conoproctus quadriplagiatus*, Lacord.

2. **Madarus corvinus.** (Tab. XVIII. figg. 26, 26 a, ♂.)

Calandra corvina, Fabr. Syst. Eleuth. ii. p. 435¹.

Madarus corvinus, Boh. in Schönh. Gen. Cure. iii. p. 638².

♂. Fifth ventral segment subtruncate at the apex (leaving the pygidium narrowly exposed beneath); antennæ inserted beyond the middle of the rostrum.

♀. Fifth ventral segment rounded at the apex (the pygidium scarcely visible from beneath); antennæ inserted at the middle of the rostrum.

Hab. NICARAGUA, Chontales (*Belt*: ♀); PANAMA, Bugaba (*Champion*: ♂).—SOUTH AMERICA¹, Brazil².

Two males and two females. Recognizable by the deeply sinuate base of the prothorax; the almost smooth elytra (the faint striæ being visible at the sides only), which are considerably dilated at the shoulders; the squamose, bifurcate basal portion of the prosternum, and the deep transverse fovea near its apical margin. The femora are clavate, the anterior pair sometimes with indications of a short tooth. The exposed intercoxal portion of the metasternum is triangular.

3. *Madarus heterosternus*, sp. n. (Tab. XVIII. figg. 27, 27 a, ♀.)

Oblong-rhomboidal, broad, flattened above, glossy-black, glabrous. Head very finely punctate; rostrum stout, arcuate, rather longer than the head and prothorax, the antennæ inserted at about the middle, the antennal club oblong-ovate. Prothorax conical, feebly constricted in front, deeply sinuate at the base, the median lobe rounded at the apex and greatly produced; sparsely, very finely punctate. Scutellum arcuate. Elytra depressed before and behind the swollen humeri, faintly lineato-punctate, the sutural and outer striæ alone visible, the interstices with scattered excessively minute punctures. Pygidium coarsely punctate. Beneath with fine widely scattered punctures. Prosternum somewhat tumid between the coxæ anteriorly, and with a very deep transverse subapical fovea, in the centre of which is a transverse tubercle, the basal process (fig. 27 a) deeply triangularly emarginate behind and completely bare. Femora clavate, unarmed.

Length $8\frac{1}{2}$, breadth $4\frac{1}{10}$ millim. (♀.)

Hab. GUATEMALA, Cerro Zunil, Pacific slope (*Champion*).

One female. Extremely like *M. corvinus*, and only separable therefrom by the obliquely narrowed prothorax, with longer median lobe, the distinct sutural stria, the glabrous prosternal process, and the more coarsely punctured pygidium, the subapical fovea of the prosternum enclosing a transverse tubercle.

4. *Madarus cornix*. (Tab. XVIII. figg. 28, 28 a, ♂.)

Madarus cornix, Kirsch, Berl. ent. Zeitschr. 1869, p. 219¹.

♂. Fifth ventral segment sinuato-truncate at the apex (leaving the pygidium narrowly exposed beneath); antennæ inserted beyond the middle of the rostrum.

♀. Fifth ventral segment rounded at the apex (the pygidium scarcely visible from beneath); antennæ inserted at about the middle of the rostrum, the apical portion slightly narrowed.

Hab. MEXICO, Misantla (*Godman*); NICARAGUA (*Sallé*), Chontales (*Belt*); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*).—COLOMBIA, Bogota¹.

Of this species we have obtained nine specimens from within our limits. It is smaller and narrower than *M. corvinus*; the median lobe of the prothorax is truncate; the scutellum is smaller; the elytra are less dilated at the shoulders, obsoletely punctate-striate, and with scattered excessively minute punctures in the interstices; the prosternum is, at most, feebly bifoveate near the apex, and the basal process is bare and not so deeply emarginate. The type (♀) has been kindly communicated by Dr. Heller for comparison.

5. *Madarus chiriquensis*, sp. n. (Tab. XVIII. figg. 29, 29 a, ♀.)

Elongate, somewhat fusiform, glossy-black, glabrous. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, abruptly thickened and closely punctate in its basal fourth, for the rest slender and almost smooth, the antennæ inserted near the base. Prothorax transverse, rather convex, constricted and much narrowed in front, the sides strongly rounded anteriorly and parallel at the base; very sparsely, minutely punctate. Scutellum concave. Elytra gradually narrowing from the base, transversely depressed anteriorly; very finely lineato-punctate, striate at the apex, the interstices each with a single row of excessively minute punctures. Pygidium densely punctate, rounded at the tip, nearly as long as broad. Beneath sparsely and rather coarsely punctate, a broad space down the middle much smoother. Prosternum deeply bifoveate

near the apex, the broad basal portion very shallowly arcuate-marginate. Anterior coxæ separated by nearly twice their own width. Legs rather elongate, comparatively slender: anterior and intermediate femora feebly dentate; anterior tibiæ subangularly dilated on the inner side near the base; anterior tarsi slightly dilated and hairy.

Length 6, breadth $2\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen, evidently a female, to judge from the form of the rostrum and of that of the last ventral segment. Narrower and less cuneiform than *M. velatipes*, Kirsch, from Bogota, the prothorax less abruptly narrowed in front, the elytra obsoletely striate to near the apex, the anterior tibiæ dilated on the inner side near the base. *M. tarsalis*, Kirsch, from Bogota, is yet another allied form, both these insects having long, dilated, and very hairy anterior tarsi in the male sex.

6. *Madarus clavipes*, sp. n. (Tab. XVIII. figg. 30, 30 a, ♀.)

Broad, subfusiform, glossy-black, glabrous. Head finely punctate, unimpressed between the eyes; rostrum curved, as long as or longer than the head and prothorax, the basal portion thickened and rather coarsely punctate laterally, the longer apical portion sparsely, finely punctate, the antennæ inserted far behind the middle. Prothorax large, moderately convex, broader than long, rounded at the sides, rapidly narrowed from the middle forwards, feebly constricted in front, deeply sinuate at the base; sparsely, very finely punctate, faintly strigose on the flanks. Scutellum arcuate. Elytra rapidly narrowed from the base, transversely depressed anteriorly; very finely lineato-punctate, striate at the sides and apex, the interstices each with a row of excessively minute punctures. Pygidium densely punctate, about as long as broad. Meso- and metasternum coarsely punctate at the sides, the rest of the under surface more finely punctured, the ventral segments 2-5 still smoother. Prosternum feebly bifoveate near the apex, the very broad basal portion subtruncate behind. Femora clavate, each with a very small tooth.

Length $6\frac{1}{10}$ - $6\frac{2}{3}$, breadth 3 millim. (♀.)

Hab. GUATEMALA, Chiacam in Vera Paz (*Champion*); PANAMA, Bugaba (*Champion*).

Three specimens, varying in the length of the rostrum, but evidently all females. This insect is of about the same size and shape as *M. vitiosus*; but it has a relatively larger, less constricted prothorax, more even elytra, a broader scutellum, a non-sulcate prosternum, and feebly toothed, clavate femora.

7. *Madarus mirandillæ*, sp. n. (Tab. XVIII. figg. 31, 31 a, ♀.)

Elongate, subfusiform, glossy-black, glabrous. Head sparsely, minutely punctate, transversely depressed between the eyes; rostrum a little longer than the head and prothorax, arcuate, moderately stout, slightly thickened towards the base, finely punctate, the antennæ inserted at the middle. Prothorax distinctly broader than long, subconical, feebly constricted in front; very finely, somewhat closely punctate. Elytra gradually narrowing from the base, transversely depressed anteriorly; very finely and shallowly punctate-striate, the striæ becoming deeper at the sides, the interstices minutely, confusedly punctate. Pygidium closely punctate. Meso- and metasternum coarsely punctate at the sides, the rest of the under surface very sparsely and finely punctured. Pronotum unimpressed behind the transverse subapical groove, the basal process truncate, foveate in the middle posteriorly. Anterior coxæ separated by rather more than their own width. Femora clavate, unarmed.

Length $5\frac{1}{4}$, breadth $2\frac{1}{4}$ millim. (♀.)

Hab. GUATEMALA, Mirandilla, Pacific slope (*Champion*).

One female. Less elongate than *M. scaphiformis*, the elytra more distinctly striate on the disc, the interstices not costate at the apex, the prosternum unimpressed, the femora not sulcate, the rostrum not flattened towards the apex. The prothorax is subconical, and narrower and less convex than in *M. clavipes*, &c. The minute interstitial punctuation of the elytra is rather close.

8. *Madarus eutoxoides*, sp. n. (Tab. XVIII. figg. 32, 32 a, ♂.)

Elongate, subfusiform, black, shining, glabrous. Head finely punctate, transversely grooved between the eyes; rostrum very stout, moderately curved, about as long as the head and prothorax, rather coarsely punctate, sulcate at the sides, the antennæ inserted at the middle, the scape not nearly reaching the base, the club oblong-ovate, acuminate, about as long as joints 3-7 of the funiculus. Prothorax as long as broad, somewhat convex, subconical, the sides becoming parallel towards the base, the base deeply sinuate; sparsely, very finely punctate, the flanks finely, obliquely strigose. Elytra a little longer than the prothorax, triangular, transversely depressed at the base; very finely lineato-punctate, striate at the sides and apex, the interstices each with a row of excessively minute punctures. Pygidium large, rather convex, densely punctate. Beneath coarsely punctate along the flanks, for the rest much smoother, the second ventral segment densely, finely punctate in the middle in the ♂. Prosternum somewhat tumid between the widely separated anterior coxæ, the basal process truncate behind, the transverse subapical groove without forcæ. Femora sublinear, unarmed, the anterior pair shallowly, the others deeply, sulcate beneath. Tarsi nearly as long as the tibiæ, the anterior pair slightly dilated and with a few projecting hairs in the ♂.

Length 6, breadth $2\frac{2}{5}$ - $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, David (*Champion*: ♂), Tabernilla, Canal Zone (*Busck*, in *U.S. Nat. Mus.*: ♀).

One pair. This insect has wholly the facies of a small *Eutoxus*, but the pygidium is large and completely exposed. The prothorax is nearly as long as the elytra, and the rostrum is very stout and moderately long.

9. *Madarus tumefactus*, sp. n. (Tab. XVIII. figg. 33, 33 a, ♂.)

Elongate, somewhat fusiform; glossy-black, glabrous above, the punctures of the under surface and legs each bearing a very minute whitish scale. Head sparsely, very finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, very stout, a little longer than the head and prothorax, sparsely punctate, the antennæ inserted slightly behind the middle, the antennal club large and acuminate, as long as joints 2-7 of the funiculus. Prothorax rather convex, almost as long as broad, gradually, arcuately narrowing from the deeply sinuate base, strongly constricted and tubulate in front; sparsely, very finely punctate (except along the smooth median line), obliquely strigose on the flanks. Elytra subtriangular, depressed at the base, along the suture, on the disc beyond the middle, and behind the humeri; very finely punctate-striate, the interstices each with a row of excessively minute punctures. Pygidium large, rather convex, closely punctate. Beneath sparsely, coarsely punctate; first ventral segment slightly depressed down the middle. Prosternum transversely tumid between the widely-separated coxæ and broadly hollowed thence to the apex, the basal process shallowly arcuate-emarginate behind. Femora subclavate, unarmed, the intermediate and posterior pairs broadly sulcate beneath. Anterior tibiæ narrow. Anterior tarsi slightly dilated, joint 2 strongly transverse, the apical uncus stout.

Length $5\frac{4}{5}$, breadth $2\frac{2}{5}$ millim. (♂.)

Hab. PANAMA, Bugaba (*Champion*).

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One male. This species agrees with *M. vitiosus* in having uneven elytra, but the rostrum is very stout, the prothorax is less abruptly constricted in front, and the femora are unarmed; and the male has the prosternum transversely tumid behind and broadly hollowed thence to the apex, the anterior tibiæ narrow, and the second joint of the anterior tarsi dilated within.

10. *Madarus illustris*, sp. n. (Tab. XVIII. figg. 34, 34 *a*, *b*, ♀.)

Somewhat fusiform, broad, of a brilliant æneous or cupreo-æneous colour, glabrous above, the punctures of the under surface and legs each bearing a minute, ochreous, hair-like scale. Head closely punctate; rostrum arcuate, about as long as the head and prothorax, thickened towards the base, closely punctate, the apical half much smoother. Prothorax convex, broader than long, rounded at the sides, constricted and much narrowed in front; sparsely, finely punctate, the flanks obliquely strigose. Elytra triangular, scarcely wider than the prothorax, uneven, transversely depressed below the base; very finely striate, the striæ distinctly punctate, the interstices with minute scattered punctures, becoming asperate laterally. Pygidium large, prominent, densely punctate. Beneath coarsely and rugosely, a broad space down the middle of the metasternum and abdomen sparsely and finely, punctate. Prosternum somewhat tumid between the coxæ posteriorly and with a sharply-defined, shallow, flattened, Y-shaped sulcus on the anterior half (fig. 34 *b*). Femora sulcate beneath, unarmed.

Length $5\frac{1}{10}$ – $6\frac{4}{5}$, breadth $2\frac{2}{5}$ – $3\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Tehuantepec (*Mus. Brit.*); GUATEMALA, San Gerónimo (*Champion*).

Five specimens, four of which are from Guatemala; these latter were beaten out of hedges on the hot arid plain of Salama. Easily recognizable by the brilliant æneous, glabrous upper surface, the uneven elytra, and the anteriorly sulcate prosternum.

11. *Madarus scaphiformis*, sp. n. (Tab. XVIII. figg. 35, 35 *a*, *b*, ♀.)

Elongate, somewhat scaphiform, glossy-black, glabrous. Head finely punctate, transversely depressed between the eyes; rostrum not longer than the head and prothorax, strongly and abruptly arcuate from the base, the basal portion thickened and rather coarsely punctate laterally, the long apical portion flattened and almost smooth, the antennæ inserted far behind the middle, the antennal club rather small, ovate. Prothorax broader than long, gradually narrowing from the base, constricted in front; sparsely, finely punctate, the punctures becoming coarser on the flanks. Scutellum small, transverse, triangular. Elytra rather elongate, gradually narrowing from near the base, transversely depressed anteriorly, and obliquely compressed at the sides below the humeri; very finely lineate-punctate, striate at the sides and apex, the interstices abruptly and sharply costate at the apex and each with a line of excessively minute punctures extending thence to the base. Pygidium transverse, rugulosely punctate, separated from the last dorsal segment by a sinuous ridge. Beneath rather coarsely, the ventral segments finely and sparsely, punctate. Prosternum deeply sulcate from the apex to between the anterior coxæ, which are separated by about their own width, the basal process flattened, broadly truncate behind (fig. 36 *b* *). Femora feebly clavate, unarmed, the anterior pair shallowly, the others deeply sulcate. Tarsi rather slender.

Length $6\frac{1}{2}$, breadth 3 millim. (♀.)

Hab. COSTA RICA, Azahar de Cartago (*Underwood*).

One female. Easily distinguished by its elongate, scaphiform shape, the apically costate elytral interstices, the long, deep, parallel-sided, prosternal sulcus, and the deeply sulcate, intermediate and posterior femora.

* The numbers behind the figures 35 *b* and 36 *b* have been transposed on the Plate.

12. **Madarus vitiosus**, sp. n. (Tab. XVIII. figg. 36, 36 *a*, *b*, ♂.)

Broad, subfusiform, very shining, black, glabrous. Head sparsely, finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, rather longer than the head and prothorax, stout, gradually thickened and closely punctate at the base, for the rest very sparsely, finely punctate, in the ♀ a little longer and smoother, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax transverse, convex, rounded at the sides, abruptly narrowed and constricted in front, deeply sinuate at the base; very sparsely, minutely punctate, the flanks finely, obliquely strigose. Elytra depressed at the base and along the suture, and obliquely compressed at the sides before and beyond the middle, rapidly narrowing from the rounded humeri, the subapical callosities prominent; very finely lineato-punctate, striate at the sides and apex, the interstices subcostate at the apex and each with a row of excessively minute punctures. Pygidium densely punctate, convex in the ♂. Beneath sparsely, coarsely punctate, the abdomen very much smoother. Prosternum sulcate, the sulcus extending backward between the coxæ, widened posteriorly and also in front, the basal process shallowly arcuate-emarginate behind (fig. 35 *b*). Femora obsoletely dentate, sulcate beneath. Anterior tibiæ sinuous, dilated in their apical half in both sexes. Anterior tarsi simple in the ♂.

Length $5\frac{1}{4}$ – $6\frac{1}{2}$, breadth $2\frac{2}{5}$ –3 millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One pair. A moderately elongate, rather broad form, with glistening, uneven, obsoletely striate elytra, the subapical callosities of which are prominent, a sulcate prosternum, obliquely strigose propleura, and obsoletely dentate, sulcate femora, the anterior tarsi not dilated in the male.

13. **Madarus tremulus**, sp. n. (Tab. XVIII. figg. 37, 37 *a*, *b*, ♀.)

Moderately elongate, subfusiform, glossy-black, glabrous. Head closely punctate, transversely depressed between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, abruptly thickened and closely punctate at the base, the longer apical portion flattened and smooth, the antennæ inserted far behind the middle, the antennal club ovate and rather small. Prothorax transverse, subconical, constricted and tubulate in front; finely, somewhat closely punctate, the punctuation becoming coarser on the flanks. Elytra rapidly narrowed from the base, uneven, finely punctate-striate, the interstices each with a row of excessively minute punctures, somewhat angulate at the apex. Pygidium transverse, rugosely punctate, separated from the last basal segment by a sharp ridge. Beneath coarsely, the ventral segments 2–5 finely, punctate. Prosternum sharply sulcate to the apex, the sulcus abruptly widened between the coxæ, which are separated by about their own width, the basal process hollowed in the middle and feebly binodose, arcuate-emarginate behind (fig. 37 *b*). Femora unarmed, obsoletely sulcate, closely punctate. Anterior tibiæ sinuate within.

Length 6, breadth $2\frac{1}{5}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One female. Less elongate than *M. scaphiformis* (which has a similarly sulcate prosternum), the rostrum (♀) abruptly thickened at the base, the elytra triangular, more uneven, and distinctly striate throughout, the femora obsoletely sulcate, &c.

14. **Madarus astutus**, sp. n. (Tab. XVIII. figg. 38, 38 *a*, *b*, ♀.)

Elongate-rhomboidal, very shining, black, glabrous above, the punctures on the greater part of the under surface each bearing a minute hair-like scale. Head very finely punctate, transversely depressed between the eyes; rostrum about as long as the head and prothorax, arcuate, slender, abruptly thickened, gibbous, and closely punctate laterally at the base, smooth and flattened thence to the tip, the antennæ

inserted behind the middle. Prothorax conical, a little broader than long, constricted and tubulate in front; very sparsely, minutely punctate. Scutellum small, transverse. Elytra oblong-subtriangular, slightly wider than the prothorax, transversely depressed at the base; finely, sharply striate, the striae feebly punctate, the first and second not reaching the base, the interstices flat, each with a few scattered excessively minute punctures. Pygidium transverse, densely punctate, vertical, the last dorsal segment longitudinally carinate down the middle posteriorly. Beneath sparsely punctate. Prosternum broadly sulcate from the flattened basal process to the transverse subapical groove, the sulcus convex for some distance along the middle and bordered on each side in front of the coxæ by a short subangular ridge, the basal process margined laterally and on the same plane as the connate meso- and metasternum (fig. 38 b). Anterior coxæ separated by about their own width. Femora unarmed, sulcate.

Length $5\frac{9}{10}$, breadth $2\frac{2}{3}$ millim. (♀.)

Hab. MEXICO (*Mus. Brit.*).

One female. Distinguished amongst its allies by the flattened, slender rostrum, which is abruptly thickened and gibbous at the base, the broadly sulcate prosternum, and the sharply striate elytra, the first and second striae not reaching the base. The prosternal structure is not unlike that of *M. bisulcatus*.

15. **Madarus vorticossus.** (Tab. XIX. figg. 1, 1 a, ♂.)

Madarus vorticossus, Boh. in Schönh. Gen. Curc. iii. p. 639¹.

Madarus verticossus, Schönh. op. cit. viii. 1, p. 106².

♂. Anterior tarsi slightly dilated, hairy, the anterior tibiae also hairy within; rostrum with the narrowed apical portion a little shorter than the basal portion; first ventral segment flattened down the middle.

♀. Rostrum with the apical portion abruptly narrowed, longer than the basal portion, almost smooth, and more slender.

Hab. MEXICO^{1 2} (*Truqui*), Matamoros Izucar, Toxpam (*Sallé*), Cordova (*Knab*, in *U.S. Nat. Mus.*; *Höge*), Jalapa (*Höge*), Orizaba (*Sallé*, *H. H. Smith*), Tehuantepec (*Mus. Brit.*).

Distinguishable by the somewhat close vestiture, which is condensed into a dense oblong patch at the base of the third elytral interstice, and sometimes into a smaller patch at the base of the fifth also, the closely punctured, æneous surface, and the abruptly narrowed rostrum of the female.

16. **Madarus distigma.** (Tab. XIX. fig. 2, ♂.)

Madarus distigma, Boh. in Schönh. Gen. Curc. viii. 1, p. 107¹.

♂. Anterior tarsi slightly dilated, hairy, the anterior tibiae also hairy within; rostrum with the narrower apical portion about as long as the basal portion; prosternum transversely tumid between the coxæ anteriorly; first ventral segment flattened down the middle.

♀. Rostrum with the apical portion a little smoother, otherwise as in the ♂.

Hab. MEXICO¹, Playa Vicente (*Sallé*), Santa Lucrecia in Vera Cruz (*Knab*, in *U.S. Nat. Mus.*), Teapa (*H. H. Smith*), Yucatan (*Mus. Brit.*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA (*Mus. Brit.*), Panzos, Teleman, Chacoj, El Reposo, Rio Maria Linda (*Champion*); NICARAGUA, Managua (*Solari*); COSTA RICA, Zent and Banana River (*Knab*, in *U.S. Nat. Mus.*), Alajuela (*Orozco*), Reventazon (*Biolley*).

Very like *M. vorticosus*, but less elongate and almost glabrous above (the oblong ochreous patch at the base of the third elytral interstice and a few scattered setæ excepted); the prosternum tumid between the coxæ anteriorly in the male, deeply bifoveate at the apex; the rostrum very similarly formed, and the antennæ inserted at about the middle, in the two sexes, the anterior femora obsoletely dentate. Varies from 4–6½ millim. in length.

17. *Madarus bistrigellus*. (Tab. XIX. figg. 3, 3 a, ♂.)

Madarus bistrigellus, Boh. in Schönh. Gen. Curc. viii. 1, p. 109¹.

♂. Anterior tarsi hairy, the anterior tibiæ also with a few hairs along their inner edge at the apex; rostrum with the narrower apical portion about as long as the basal portion; first ventral segment flattened down the middle.

♀. Rostrum with the apical portion a little smoother, otherwise as in the ♂.

Hab. MEXICO (coll. Sommer¹; Truqui, in *Mus. Brit.*), Puebla, Toxpan (Sallé), Paso del Macho, Jalapa (Höge), Orizaba (H. H. Smith), Cordova (Höge; Knab, in *U.S. Nat. Mus.*); BRITISH HONDURAS (Blancaneaux); GUATEMALA, Chiacam and San Juan in Vera Paz (Champion); NICARAGUA, Chontales (Janson); COSTA RICA, Reventazon (Biolley), Zent, Puerto Limon (Knab, in *U.S. Nat. Mus.*).

Smaller than *M. distigma*; the prothorax shorter, more rounded at the sides, abruptly constricted in front, and much smoother; the elytral interstices very finely uniseriate-punctate, the oblong, ochreous or white patch at the base of the third sometimes reduced to a narrow streak; the prosternum not tumid in the male, deeply foveate as in *M. distigma*; the anterior femora distinctly dentate. The length varies from 4–5 millim. Dr. Sjöstedt informs me that this species is not represented in the Stockholm Museum.

18. *Madarus bisignatus*, sp. n. (Tab. XIX. figg. 4, 4 a, ♂.)

Elliptic, shining, black, with a slight brassy lustre; the elytra each with a dense oval patch of yellowish-white scales at the base of the third interstice and often a small spot at the base of the second also; the punctures of the under surface and legs each bearing a minute whitish scale. Head closely, minutely punctate, transversely depressed between the eyes; rostrum arcuate, moderately stout, longer than the head and prothorax, finely punctate, the antennæ inserted behind the middle, the antennal club ovate. Prothorax transverse, rounded at the sides (conspicuously so in the ♂), constricted and much narrowed in front; closely, rather coarsely punctate, rugose on the flanks. Scutellum small. Elytra rounded-triangular, comparatively short, sharply striate, the striæ feebly punctate, the interstices faintly, asperately, uniseriate-punctate. Pygidium transverse, densely punctate. Beneath closely and very coarsely, a broad space down the middle of the metasternum and abdomen finely and sparsely, punctate, the anterior half of the prosternum rugose. Prosternum bifoveate or finely sulcate in front, in the ♂ transversely tumid or sublamellate between the widely-separated coxæ anteriorly, the basal process broadly truncate behind. Femora shallowly sulcate, the anterior and intermediate pairs feebly dentate. Anterior tibiæ with a few hairs at the apex within, and the anterior tarsi slightly dilated and hairy, in the ♂.

Length 2½–3½, breadth 1½–1½ millim. (♂ ♀.)

Hab. BRITISH HONDURAS, Belize (Blancaneaux: ♂ ♀); GUATEMALA, Cahabon in Alta Vera Paz (Champion: ♀); PANAMA, Volcan de Chiriqui (Champion: ♂).

Six specimens. Smaller and shorter than *M. bistrigellus*, the elytra with the whitish spot at the base of the third interstice less elongate, the striæ broader and deeper, the interstices not so smooth, the prothorax more coarsely punctate, the prosternum (as in *M. tumefactus*) transversely tumid or lamellate between the coxæ anteriorly in the male.

19. **Madarus brevilinea**, sp. n. (Tab. XIX. figg. 5, 5 *a*, ♂.)

Somewhat fusiform, æneous, shining; the sides of the prothorax, the elytra (a broad space along the suture excepted), under surface, and legs sparsely clothed with small, hair-like, ochreous or cinereous scales, the third elytral interstice with a dense line of rather coarser, similarly-coloured scales at the base. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, stout, usually about as long as the head and prothorax, closely punctate, the apical portion much smoother in the ♀. Prothorax broader than long, rounded at the sides, rapidly narrowed in front; closely punctate, the punctures transversely confluent on the flanks. Elytra not wider than the prothorax, transversely depressed on the disc anteriorly; very finely striate, the interstices with minute, scattered punctures, which become asperate laterally, the third about equal in width throughout. Pygidium large, prominent. Beneath coarsely and rugosely, a broad space along the middle of the metasternum and abdomen very sparsely and finely, punctate. Prosternum not or feebly bifoveate in front. Anterior femora obsoletely dentate, the others sulcate beneath.

♂. Anterior tarsi slightly dilated and hairy; prosternum somewhat tumid between the coxæ anteriorly. Length 5-5½, breadth 2-2½ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente (*Sallé*), Cordova (*Höge*), Teapa (*Höge*, *H. H. Smith*).

Ten specimens, varying greatly in the length of the rostrum, apparently all females but one. Separable from *M. distigma*, &c., by its rather narrow form, the bright æneous surface, the fine vestiture, the narrower ochreous or whitish streak at the base of the third elytral interstice, and the very finely striate elytra.

20. **Madarus macrogrammus**, sp. n. (Tab. XIX. figg. 6, 6 *a*, ♂.)

Madarus macrogrammus, Jekel in litt.

Somewhat fusiform, broad, bronze-black, shining; somewhat thickly clothed (a broad space along the middle of the prothorax, the scutellum, and the first and second elytral interstices excepted) with narrow, hair-like, fulvous or fulvo-cinereous scales, the elytra with a dense ochreous vitta extending down the third interstice from the base to near the apex. Head closely punctate; rostrum strongly arcuate, about as long as the head and prothorax, thickened towards the base, closely punctate, the apical portion in the ♀ abruptly narrowed and almost smooth, the antennæ inserted at or a little behind the middle. Prothorax transverse, rather convex, rounded at the sides anteriorly, rapidly narrowed from about the middle, feebly constricted in front; closely punctured, the punctures becoming transversely confluent towards the sides. Elytra subtriangular, not or scarcely wider than the prothorax, transversely depressed on the disc anteriorly; narrowly striate, the interstices finely punctate, becoming asperate towards the sides, the second very gradually widened towards the base. Pygidium large, prominent. Beneath rugosely, a broad space along the middle of the metasternum and abdomen very sparsely and finely, punctate. Prosternum bifoveate near the apex. Anterior femora not or obsoletely dentate.

♂. Anterior tarsi slightly dilated, hairy, the anterior tibiæ also with a few hairs within.

Length 4¾-6½, breadth 2½-2⅞ millim. (♂ ♀.)

Hab. MEXICO, Guanajuato (*Sallé*); GUATEMALA (*Mus. Brit.*; *Sallé*), El Tumbador, Cerro Zunil, Calderas, Capetillo, Dueñas, Aceituno, San Gerónimo (*Champion*); COSTA RICA (*coll. Fry*).

This is a form of *M. vorticatus* with the third elytral interstice very gradually widened towards the base and the dense ochreous streak continued along it to near the apex. *M. macrogrammus* was found in abundance at Cerro Zunil and is contained in most collections from Guatemala. The single specimen from Guanajuato has the sides of the prothorax strongly rounded from the base. The anterior femora sometimes have indications of a small tooth.

21. *Madarus bilineatus*, sp. n. (Tab. XIX. fig. 7, ♂.)

Very like *M. macrogrammus*, but almost bare above (the ochreous vitta on the third elytral interstice excepted), the scales on the under surface and legs very small and inconspicuous; the upper surface a little smoother; the rostrum of the ♀ with the apical portion abruptly narrowed and almost smooth; the anterior tarsi of the ♂ slightly dilated and hairy, the anterior tibiae also with long hairs within. Length $5\frac{1}{4}$ – $6\frac{1}{2}$, breadth $2\frac{1}{3}$ – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Playa Vicente (*Sallé*), Cordova (*Höge*); GUATEMALA, Chacoj in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt*), Managua (*Solari*); COSTA RICA, Talamanca, Reventazon (*Biolley*); PANAMA, Bugaba (*Champion*).

Numerous examples. This insect bears exactly the same relation to *M. macrogrammus* as does *M. distigma* to *M. vorticatus*, and it is not improbable that all four of them may have to be treated eventually as forms of one variable species. For the present, however, it is best to keep them separate. The scales are wanting on the upper surface (the streak or vitta on the third elytral interstice excepted) in *M. distigma*, *M. bilineatus*, and *M. bistrigellus*, but this does not appear to be due to abrasion. The elytral vittæ in the present species vary in length, sometimes not extending beyond the middle.

22. *Madarus excavatus*, sp. n. (Tab. XIX. figg. 8, 8a, ♂.)

Somewhat fusiform, shining, piceous; clothed above with scattered, rather coarse, whitish scales, which are condensed on the prothorax into a submarginal stripe and on the elytra into various irregular sub-confluent streaks and spots (a spot at the base of the 3rd and 9th interstices, a streak at the middle of the 4th, and a spot near the apex, being perhaps the most conspicuous); the under surface and legs also set with small, hair-like, whitish scales, the metathoracic episterna with a dark streak of coarser scales. Head finely punctate, transversely impressed between the eyes; rostrum (♂) strongly arcuate, longer than the head and prothorax, gradually thickened towards the base, closely punctate, becoming smoother towards the tip, (♀) smooth, slender, and less curved, with the short basal portion abruptly thickened and punctate, the antennæ inserted at about the basal fourth or fifth in the two sexes. Prothorax rather broader than long, rounded at the sides, rapidly narrowed and feebly constricted in front; sparsely, very finely punctate on the disc, obliquely strigose on the flanks. Elytra triangular, broadly, transversely excavate on the disc anteriorly; sharply, narrowly striate, the interstices with scattered very minute punctures. Pygidium transverse, vertical in ♂. Beneath rugosely, a broad space down the middle sparsely and finely, punctate. Prosternum with a transverse impression in front, in the ♂ abruptly sloping from the broad, flattened, smoother intercoxal space. All the femora feebly dentate. Anterior tarsi in the ♂ clothed with projecting pallid bristly hairs.

Length $4\frac{2}{3}$ –5, breadth 2 – $2\frac{1}{8}$ millim. (♂ ♀.)

Hab. PANAMA, Caldera in Chiriqui, Taboga I. (*Champion*).

One pair. The broadly excavate elytra and the interruptedly reticulate arrangement of the vestiture readily distinguish *M. excavatus*. The rostrum is very differently formed in the two sexes, it being abruptly smooth and slender from the thickened basal portion in the female. The markings at the base of the elytra form a common irregular angulated fascia.

23. *Madarus fusiformis*, sp. n. (Tab. XIX. figg. 9, 9 a, ♂.)

Subfusiform, shining, nigro-æneous, the antennal scape and the tips of the tarsi ferruginous; the prothorax with a broad space along the sides, and the elytra with an irregular fascia at the base, an angulate, narrower fascia beyond the middle, and several small scattered spots, clothed with oblong ochreous scales; the rugose portions of the under surface also set with similar scales. Head closely punctate, transversely depressed between the eyes; rostrum stout, arcuate, about as long as the head and prothorax, closely, rugosely punctate, the antennæ inserted near the middle, joints 3-7 of the funiculus rapidly widening outwards, 7 as wide as the club. Prothorax broad, transverse, rounded at the sides anteriorly, constricted in front; closely punctate, rugose at the sides. Elytra triangular, not wider than the prothorax, slightly depressed at the base; narrowly striate, the interstices roughly uniseriate-punctate. Pygidium large, prominent. Beneath rugosely punctate, except along the broad, shining, sparsely punctate, bare median space; first ventral segment depressed down the centre. Prosternum abruptly sloping from the wide, flattened, intercoxal space, bifoveate in front. Legs rugose; femora sublinear, unarmed; anterior tarsi slightly dilated and hairy.

Length $4\frac{1}{8}$, breadth $1\frac{7}{8}$ millim. (♂.)

Hab. MEXICO, Chilpancingo in Guerrero (*Höge*).

One male. Not unlike *M. excavatus*; the elytra more rapidly narrowed from the base, simply flattened on the disc, and with the rather coarse vestiture differently arranged; the rostrum much shorter; the prothorax more closely punctate; the femora unarmed; the pygidium larger and more prominent.

24. *Madarus bisulcatus*, sp. n. (Tab. XIX. figg. 10, 10 a, ♀.)

Oblong, subeuneiform, very shining, nigro-piceous; the elytra with a few narrow, hair-like, white scales, which are condensed into faint spots at the base, a short streak behind the scutellum, and a curved median fascia; the under surface with scattered smaller white scales along the sides, the scales clustered into a short streak on the metathoracic episterna. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, thickened and compressed towards the base, the basal portion rather coarsely punctate laterally, for the rest almost smooth, the antennæ inserted behind the middle. Prothorax transverse, rounded at the sides anteriorly, strongly constricted and tubulate in front; almost smooth, the flanks faintly aciculate. Scutellum triangular, small. Elytra subeuneiform, blunt at the tip, transversely depressed anteriorly; obsoletely striate, the striæ scarcely traceable on the inner part of the disc, the first becoming sharply defined beyond the middle, the interstices smooth and flat, the third raised at its point of termination. Pygidium small, transverse, subvertical. Meso- and metasternum and first ventral segment rather coarsely punctate at the sides, the rest of the under surface almost smooth. Prosternum with two narrow sulci, the intercoxal portion about as wide as the coxæ and hollowed anteriorly. Anterior femora dentate, the others shallowly sulcate.

Length $4-4\frac{1}{2}$, breadth $1\frac{1}{2}-2$ millim. (♀.)

Hab. GUATEMALA, Senahu and Cahabon in Alta Vera Paz (*Champion*).

Two females. Smoother and more rapidly narrowed posteriorly than *M. ochreoguttatus*, the vestiture still sparser, the intercoxal portion of the prosternum hollowed anteriorly, the inner striæ of the elytra (the first excepted) scarcely traceable, the anterior femora feebly dentate.

25. *Madarus ochreoguttatus*, sp. n. (Tab. XIX. figg. 11, 11 a, ♀.)

Oblong, subelliptic, shining, piceous; the sides of the prothorax and the entire under surface (except along the median third) clothed with scattered narrow ochreous scales, the similarly-coloured vestiture of the elytra mainly condensed into a dense spot at the base of each of the 3rd and 7th interstices and an angulate median fascia (extending from the 3rd to the 8th stria), the metathoracic episterna also with a dense ochreous streak. Head very finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, rather longer than the head and prothorax, the basal half stout, closely punctate at the sides, the apical half more slender and almost smooth, the antennæ inserted at a little behind the middle. Prothorax transverse, gradually narrowing from the base, constricted in front; sparsely, minutely punctate on the disc, obliquely strigose at the sides. Scutellum small, subtriangular. Elytra oblong-subtriangular, transversely depressed on the disc anteriorly; finely striate, the outer striæ distinctly punctate, the interstices sparsely, minutely punctate, flat to near the apex, where they are narrowly costate. Pygidium small, transverse, subvertical. Beneath coarsely punctate along the sides, the bare median portion very much smoother, the flanks and anterior half of the prosternum rugose; the prosternum with two narrow sharply-defined sulci extending backward to the moderately broad flattened intercoxal space. Femora subclavate, unarmed.

Length $5\frac{1}{2}$, breadth $2\frac{1}{8}$ - $2\frac{1}{4}$ millim. (♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*).

Two females. The prothorax in this insect (at least in the female) is a little less dilated than in the allied forms. The ochreous median fascia and the two spots at the base of each elytron are sharply defined. The prosternum has two narrow sulci as in *M. bisulcatus*.

MADARELLUS.

Madarellus, Casey, Ann. N. York Acad. Sci. vi. pp. 466, 540 (1892); vii. p. 603.

The type of this genus is the N.-American *M. undulatus* (Say) and various other species have since been added by Casey and Solari; *Madarus ebenus* (F.), *M. laticollis* and *M. singularis*, Boh., and *Baridius impressus* and *B. fasciatus*, Kirsch, also belong here. *Madarellus* is connected with *Madarus* by intermediate forms; but it is convenient to retain the name for various moderate-sized or small, glabrous, species with a comparatively short, abruptly tubulate prothorax, uneven elytra, bisulcate prosternum, and sulcate femora, the anterior pair invariably with a conspicuous tooth or angular dilatation. With the exception of *M. jalapanus*, they are all somewhat cuneiform in shape, due to their relatively broad, transversely convex prothorax. The prosternal sulci are parallel or oblique, and sometimes confluent (as in *Madarus illustris*), receiving the base of the antennæ in repose. The Central-American forms are somewhat numerous and difficult to separate satisfactorily.

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3 CC

a. Body more or less cuneiform.

*a*¹. Elytra immaculate.

*a*². Prothorax concolorous with the elytra.

*a*³. Elytra obsoletely or faintly striate on the disc.

*a*⁴. Femoral tooth long and stout: species large (length over 5 mm.) *inæqualis*, sp. n.

*b*⁴. Femoral tooth short, subtriangular: species smaller (length under 5 mm.).

*a*⁵. Basal process of the prosternum binodose anteriorly . . . *eruptus*, sp. n.

*b*⁵. Basal process of the prosternum flattened *dilutus*, sp. n.

*b*³. Elytra deeply striate throughout; femoral tooth sharp.

*c*⁴. Elytra very uneven; prothorax strongly strigose at the sides . *impressus*, Kirsehl.

*d*⁴. Elytra less uneven; prothorax moderately strigose at the sides *cuneatus*, Casey.

*c*³. Elytra very finely striate throughout; femoral tooth triangular.

*e*⁴. Body æneous *mexicanus*, Solari.

*f*⁴. Body black *striatulus*, sp. n.

*b*². Prothorax rufescent, elytra black, the latter narrowly striate;

femoral tooth short and broad *puniceicollis*, sp. n.

*b*¹. Elytra rufo-maculate, narrowly striate; femoral tooth sharp.

*c*². Basal process of the prosternum closely, uniformly punctate . . *rufomaculatus*, sp. n.

*d*². Basal process of the prosternum sparsely, finely punctate . . . *quadriguttatus*, sp. n.

*c*¹. Elytra rufescent, faintly fuseo-maculate, narrowly striate; prothorax

rufescent, smooth; femoral tooth sharp *lævicollis*, sp. n.

b. Body elliptic, black; elytra sharply striate; femoral tooth bluntly

triangular *jalapanus*, sp. n.

1. *Madarellus inæqualis*, sp. n. (Tab. XIX. figg. 12, 12 *a*, ♂.)

Madarus inæqualis, Chevr. in litt.

Broad, robust, cuneiform, very shining, black, sometimes with a faint brassy lustre; glabrous above, the punctures of the under surface and legs each bearing a very minute ochraceous scale. Head finely punctate, transversely depressed between the eyes; rostrum as long as or a little longer than the head and prothorax, very stout, strongly arcuate, closely punctate, the antennæ inserted at about the middle. Prothorax transversely convex, broad, somewhat rounded at the sides, abruptly narrowed and tubulate in front; almost smooth on the disc, obliquely strigose and finely punctate at the sides, the basal margin with a row of fine punctures. Elytra triangular, very uneven (the transverse basal excavation deep and the subapical callosities prominent); finely punctate-striate, the striæ 2-4 partly obliterated on the disc, the interstices flat and almost smooth. Pygidium densely punctate. Beneath coarsely and closely, a broad space down the middle of the metasternum and abdomen sparsely and finely, punctate, the propleura obliquely rugose. Prosternum with two short longitudinal sulci near the apex. Anterior coxæ widely separated. Legs rugosely punctate; femora sulcate beneath, the anterior pair armed with a stout, oblique, truncated tooth and sometimes with a smaller tooth on the opposite ridge in a line with it, the other femora also with a small tooth, all faintly serrulate between this and the base; anterior tibiæ widened on the inner edge from about the basal third; anterior tarsi slightly dilated and hairy in the ♂.

Length $5\frac{1}{10}$ - $6\frac{1}{8}$, breadth $2\frac{3}{5}$ - $3\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*), Toxpam (*Sallé*), Cordova (*Höge*), Temax in Yucatan (*Gaumer*); GUATEMALA, San Gerónimo (*Champion*).

This species is contained in most collections from Mexico and it has long been known under Chevrolat's MS. name. *M. inæqualis* is closely related to the South-American and Antillean* *M. laticollis*, Boh., from which it differs in its rather larger size, the stouter rostrum, the more rugose propleura and legs, and the less excavate sides of the prothorax in front in the male, the excavation in *M. laticollis* being limited by a distinct prominence in that sex.

2. *Madarellus eruptus*, sp. n.

Cuneiform, very shining, nigro-piceous, with a distinct æneous lustre, almost glabrous. Head very finely punctate, transversely depressed between the eyes; rostrum rather longer than the head and prothorax, strongly arcuate, moderately stout, the basal portion thickened and coarsely punctate laterally, the longer apical portion abruptly flattened and faintly punctate, the antennæ inserted behind the middle. Prothorax transversely convex, almost as wide as the elytra, rounded at the sides anteriorly, the tubulate apical portion narrow; the surface with widely-scattered excessively minute punctures, the flanks faintly strigose. Elytra subtriangular, depressed at the base, on the outer part of the disc beyond the middle, along the suture anteriorly, and at the sides below the humeri, the subapical callosities very prominent; finely striate, the striæ faintly punctate, the interstices flat, angularly-raised at the apex, each with a single row of excessively minute punctures. Pygidium transverse, closely punctate. Beneath coarsely punctured along the sides, the propleura obliquely strigose, the median portion of the pro- and metasternum and the ventral segments very sparsely, finely punctate. Prosternum with two confluent sulci, the broad basal process binodose and somewhat abruptly declivous anteriorly. Anterior femora with a short, broad, triangular tooth. Anterior tibiæ sinuous, dilated on the inner edge beyond the middle.

Length $3\frac{1}{2}$ – $4\frac{7}{8}$, breadth $1\frac{3}{4}$ – $2\frac{1}{2}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Two specimens. A very shining form, with an almost smooth prothorax, finely striate, uneven elytra, an abruptly flattened rostrum (in the female), and a short broad tooth to the anterior femora, the basal process of the prosternum hollowed and binodose between the widely-separated anterior coxæ†.

3. *Madarellus dilutus*, sp. n.

Cuneiform, shining, fusco-castaneous, the legs and rostrum nigro-piceous, almost glabrous. Head finely punctate, transversely grooved between the eyes; rostrum a little longer than the head and prothorax, strongly and regularly arcuate, stout, thickened towards the base, closely punctate, the antennæ inserted at about the middle. Prothorax transversely convex, rounded at the sides anteriorly, the tubulate apical portion narrow; the surface with excessively minute, widely-scattered punctures, the flanks finely, obliquely strigose and more distinctly punctate. Elytra subtriangular, depressed at the base, on the outer part of the disc beyond the middle, along the suture anteriorly, and at the sides below the humeri; finely striate, the striæ faintly punctate, the inner ones (the first excepted) almost obsolete on the inner part of the disc, the interstices flat, angularly raised at the apex, each with a row of excessively minute punctures. Pygidium transverse, closely punctate. Beneath coarsely, the ventral

* I have seen a long series of this insect from St. Vincent, Grenada, &c.

† Much as in the males of the species of *Glyptobaris*.

segments 2-5 sparsely and more finely, punctate, the propleura obliquely strigose. Prosternum with two confluent sulci, the broad basal process flattened and somewhat abruptly declivous anteriorly. Femora sulcate, the anterior pair armed with a triangular tooth and a smaller tooth in a line with it on the opposite ridge beneath. Anterior tibiae sinuous, dilated from a little beyond the middle to the apex. Anterior tarsi with a few bristly hairs.

Length $3\frac{1}{2}$ -4, breadth 2 millim. (♂.)

Hab. GUATEMALA, Las Mercedes, Pacific slope (*Champion*).

Two males. Very like *M. eruptus*, but with a less polished surface, the rostrum (♂) stout and regularly arcuate, the inner dorsal striae of the elytra less distinct, the subapical callosities less prominent, the basal process of the prosternum flattened.

4. *Madarellus impressus*.

Baridius impressus, Kirsch, Berl. ent. Zeitschr. 1869, p. 212¹.

Hab. GUATEMALA, San Gerónimo in Vera Paz, Zapote (*Champion*); PANAMA, San Miguel in the Pearl Is. (*Champion*).—COLOMBIA, Bogota¹.

Of this species we have obtained six specimens from our limits, agreeing with the type communicated by Dr. Heller. Distinguishable amongst the small allied forms by the very uneven, deeply striate elytra, the conspicuously strigose outer portion of the disc of the prothorax, and the rugosely punctate legs and under surface. The anterior femora have a stout, subtriangular tooth, and the other femora are obsoletely dentate. The prosternal sulci are confluent, together forming a broad subtriangular excavation.

5. *Madarellus cuneatus*.

Madarellus cuneatus, Casey, Ann. N. York Acad. Sci. vii. p. 603 (1893)¹.

Madarellus caseyi, Solari, Ann. Mus. Genova, xlii. p. 424 (1906)².

Hab. NORTH AMERICA, San Antonio¹ and Brownsville, Texas.—MEXICO (*Mus. Brit.*), Teapa (*Höge*), Temax in N. Yucatan (*Gaumer*); BRITISH HONDURAS¹, Belize, Rio Hondo (*Blancaneaux*); GUATEMALA, Zapote (*Champion*); NICARAGUA, Tipitapa, Lake Managua² (*Solari*).

M. cuneatus and *M. caseyi* were each described from a single specimen, the latter (kindly communicated by Signor Solari) having the prothorax more distinctly punctate than in the Texan *M. cuneatus*, for examples of which we are indebted to Capt. Casey and Mr. Wickham, and the U.S. National Museum. The long series from Yucatan before me shows that the present species is very variable in size, and the prothorax is sometimes convex and broader than the elytra, and rather coarsely punctate, the line of punctures along the basal margin being always distinct. The tooth on the anterior femora is stout and rather long. The anterior tibiae are widened at about the middle within. The prosternal sulci are sometimes confluent. The

upper surface varies in colour from nigro- to rufo-piceous, and usually has a bright brassy lustre. The elytra are depressed at the base, on the disc beyond the middle, along the suture anteriorly, and at the sides below the humeri, and have sharply-cut, distinctly punctate striæ. The length varies from $2\frac{1}{2}$ - $3\frac{3}{4}$, and the breadth from 1-2 mm.

6. *Madarellus mexicanus*.

Madarellus mexicanus, Solari, Ann. Mus. Genova, xlii. p. 426 (1906) ¹.

Hab. MEXICO, Jalapa * (*Höge* ¹).

This species is represented in our collection by a very small reddish specimen (length $2\frac{1}{2}$ mm.) from Jalapa, the types (which I have seen) being much larger and broader. It may be known by the brilliant æneous surface and the finely striate elytra, the prothorax with very minute widely-scattered punctures on the disc. The tooth on the anterior femora is stout and subtriangular. The striæ are almost as fine as in *M. striatulus*, and faintly punctate.

7. *Madarellus striatulus*, sp. n.

Cuneiform, shining, black, the tarsi sometimes ferruginous, the punctures of the under surface and legs each bearing an excessively minute whitish scale. Head sparsely, very finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, about as long as the head and prothorax, closely punctate, the antennæ inserted behind the middle. Prothorax transversely convex, rounded at the sides anteriorly, tubulate in front; almost smooth, the lateral portions finely, obliquely strigose. Elytra subtriangular, strongly, transversely depressed at the base and at the sides before and beyond the middle; very finely and lightly striate throughout, the striæ almost impunctate, the interstices smooth. Pygidium transverse, densely punctate. Beneath coarsely, a broad space down the middle sparsely and finely, punctate, the propleura obliquely strigose. Prosternum with two sulci. Legs rugosely punctate; anterior femora with a triangular tooth; anterior tibiæ sinuate within; anterior tarsi slightly dilated and hairy in the ♂.

Length $2\frac{2}{5}$ -3, breadth $1\frac{1}{8}$ - $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Livingston (*Barber*, in *U.S. Nat. Mus.*), Cahabon (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

One specimen from each locality. In this species the elytra are very finely and lightly striate throughout, a character distinguishing *M. striatulus* from nearly all the allied forms here enumerated. The upper surface is black, as in *M. impressus*, Kirsch, and the transverse basal depression of the elytra is deep and abrupt.

8. *Madarellus puniceicollis*, sp. n. (Tab. XIX. figg. 13, 13 a, ♂.)

Cuneiform, shining, black, the prothorax, and in one specimen the under surface in part, rufous, almost glabrous. Head finely punctate, transversely grooved between the eyes; rostrum a little longer than the head and prothorax, moderately stout, thickened towards the base, finely punctate, the apical half

* The dealer's locality given by Solari, "Sierra de Durango," is almost certainly incorrect, the insect doubtless being from Vera Cruz.

smooth and polished in the ♀, the antennæ inserted just behind the middle. Prothorax much broader than long, transversely convex, rounded at the sides anteriorly, abruptly narrowed in front; sparsely, minutely punctate, finely strigose on the outer part of the disc, and with a row of coarser punctures along the basal margin. Elytra triangular, depressed at the base, along the suture anteriorly, on the middle of the disc, and at the sides below the humeri; sharply, finely striate, the striae distinctly punctate, the interstices almost smooth, angularly raised at the apex. Pygidium strongly transverse, finely punctate, somewhat concave. Beneath coarsely punctate along the sides, the propleura obliquely strigose, the ventral segments sparsely, finely punctate. Prosternum bisulcate anteriorly, the space between the sulci flattened and depressed, the broad basal process abruptly declivous in front and in the ♂ transversely tumid. Anterior femora with a broad subtriangular tooth, the intermediate pair obsolete dentate. Anterior tibiae sinuous, slightly widened in their outer half. Tarsi slender, the anterior pair feebly dilated and hairy in the ♂.

Length $2\frac{1}{2}$ –4, breadth $1\frac{1}{3}$ –2 millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas and Calderas on the slope of the Volcan de Fuego (*Champion*).

One pair, the female much larger than the male. This species has the prosternum formed much as in the N.-American *M. undulatus* (Say) (♀), specimens of which sometimes have a red prothorax; but the elytra are rapidly narrowed from the base, the tarsi are more slender, the anterior femoral tooth is less acute, &c. *M. ruficollis*, Solari, from Peru, is another similarly-coloured form. The form of the prosterual process of the male separates *M. puniceicollis* from most of its allies.

9. *Madarellus rufomaculatus*, sp. n. (Tab. XIX. fig. 14, ♀.)

Cuneiform, shining, nigro-piceous with a faint brassy lustre, the elytra with a spot on each shoulder, and another on the disc towards the apex, rufous, the rufous coloration sometimes extending over the greater part of their surface, the legs usually more or less rufescent; the punctures on the under surface and legs each bearing an excessively minute whitish scale. Head very sparsely, minutely punctate, transversely grooved between the eyes; rostrum stout, strongly arcuate, a little longer than the head and prothorax, closely punctate, the apical portion smoother in the ♀. Prothorax transversely convex, rounded at the sides, abruptly narrowed and tubulate in front, the sides rounded anteriorly; very sparsely, minutely punctate, and with a line of coarser punctures along the basal margin; the lateral portions obliquely strigose. Elytra subtriangular, transversely depressed at the base and at the sides before and beyond the middle; sharply, finely striate, the interstices smooth and flat. Pygidium densely punctate. Beneath closely punctate (the basal process of the prosternum included), the punctures very coarse along the sides, the propleura obliquely strigose. Prosternum with two shallow sulci. Legs rugosely punctate; anterior femora with a triangular tooth; anterior tibiae sinuous, dilated on the inner side beyond the middle.

Length 2–3, breadth $1-1\frac{3}{8}$ millim. (♂ ♀.)

Hab. BRITISH HONDURAS, Belize, Rio Hondo (*Blancaneaux*); GUATEMALA, Telemán (*Champion*), Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*); PANAMA, David (*Champion*).

Twelve specimens, varying greatly in size and in the extent of the rufous coloration of the elytra, the four red spots are, however, always conspicuous. *M. rufomaculatus* approaches *M. cuneatus*, but may be known from it by the more narrowly striate elytra, the triangular femoral tooth, and the dense uniform punctuation of the basal process of the prosternum.

10. *Madarellus quadriguttatus*, sp. n.

Cuneiform, shining, black with a faint æneous lustre, the elytra each with a spot on the shoulder and another near the apex (almost connected along the outer part of the disc), and the antennæ, tibiæ, and tarsi in part, ferruginous; the punctures on the legs and under surface each bearing a minute whitish scale. Head finely punctate, transversely grooved between the eyes; rostrum stout, arcuate, as long as the head and prothorax, closely punctate, the apical half smoother and somewhat flattened, the antennæ inserted behind the middle. Prothorax transversely convex, rounded at the sides anteriorly, tubulate in front; the surface with widely scattered minute punctures, the lateral portions finely, obliquely strigose. Elytra rather long, subtriangular, transversely depressed at the base and at the sides before and beyond the middle; sharply, narrowly striate, the striæ feebly punctate, the interstices smooth. Pygidium densely punctate. Beneath coarsely, a broad space down the middle sparsely and finely, punctate, the propleuræ obliquely strigose. Prosternum with two oblique confluent sulci. Legs rugosely punctate; anterior femora with a triangular tooth; anterior tibiæ sinuous within.

Length $3\frac{1}{4}$, breadth $1\frac{2}{5}$ millim. (♀.)

Hab. MEXICO (*ex coll. Flohr*).

One specimen. Very like *M. rufomaculatus*, but with the elytra a little longer, the striæ not so fine, the basal process of the prosternum and the median portion of the metasternum and abdomen very sparsely finely punctate.

11. *Madarellus lævicollis*, sp. n. (Tab. XIX. figg. 15, 15 a, ♀.)

Cuneiform, shining, ferruginous, the elytra with the scutellar region and a transverse patch on the disc beyond the middle slightly infuscate; the punctures on the under surface and legs each bearing an excessively minute whitish scale. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, a little longer than the head and prothorax, closely, finely punctate, the antennæ inserted at the middle. Prothorax transversely convex, narrowly and abruptly tubulate in front, the sides rounded anteriorly; smooth, the lateral portions feebly strigose. Elytra subtriangular, depressed at the base and at the sides before and beyond the middle; finely striate, the striæ obsoletely punctate, the interstices smooth. Pygidium strongly transverse, densely punctate. Beneath closely, a broad space down the middle sparsely and finely, punctate. Prosternum with two curved sulci. Legs rugosely punctate; anterior femora with a triangular tooth; anterior tibiæ sinuous within.

Length $2\frac{3}{4}$, breadth $1\frac{2}{5}$ millim. (♀?)

Hab. GUATEMALA, Capetillo (*Champion*).

One specimen. Distinguishable by its rufous colour, almost smooth, transversely convex prothorax, and finely striate, submaculate elytra, the under surface with a broad space down the middle sparsely punctate.

12. *Madarellus jalapanus*, sp. n.

Oblong, elliptic, shining, black, almost glabrous. Head finely punctate, transversely grooved between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, thickened and closely punctate at the base, the longer apical portion smooth and moderately stout, the antennæ inserted at about the basal third. Prothorax transverse, gradually and arcuately narrowing from the base, constricted and tubulate in front; almost smooth on the disc, the lateral portions finely strigose, the base with a row of punctures along the margin. Elytra subtriangular, moderately long, transversely depressed at the base, behind the shoulders, and at about the middle of the disc; sharply striate, the striæ obsoletely punctate, the interstices smooth. Pygidium transverse, closely punctate. Beneath, a broad smoother space down the middle excepted, sparsely punctate, the punctures on the sides of the

metasternum coarse, the propleura finely, obliquely strigose. Prosternum with two shallow oblique sulci. Femora shallowly sulcate, the anterior pair broadly, feebly dentate. Anterior tibiae sinuous, slightly dilated beyond the middle within.

Length $3\frac{2}{3}$, breadth $1\frac{1}{6}$ millim. (♀.)

Hab. MEXICO, Jalapa (*J. T. Mason, in U.S. Nat. Mus.*).

One female. Differs from the small allied species in its oblong, elliptic form (*i. e.* in having the prothorax less dilated) and somewhat elongate elytra. The anterior femora are angularly dilated rather than toothed.

ACANTHOMADARUS, gen. nov.

Rostrum very stout, strongly arcuate, about three-fourths the length of the body, the antennae inserted beyond the middle, the scrobes confluent beneath and continued as a deep sulcus to the base; mandibles stout, notched within, strongly decussate; head globose, rather small; eyes finely faceted, moderately large; prothorax subquadrate, very abruptly narrowed and tubulate in front, deeply bisinuate at the base, the median lobe impinging on the narrow crescentiform scutellum; elytra oblong-subtriangular, not wider than the prothorax; pygidium large, fully exposed, subvertical; prosternum declivous, unimpressed in front, the basal process armed with a very large, erect, compressed, conical protuberance; anterior coxae widely separated; mesothoracic epimera large, partly visible from above; meso- and metasternum connate, the narrow exposed portion of the former on the same plane as the latter; legs short; femora moderately clavate, unarmed; tibiae strongly unguiculate; tarsi rather slender, the claws long, narrowly separated at the base; body robust, oblong or cuneiform, glabrous, polished.

Type, *A. dirus*.

This genus includes a single species, remarkable on account of the stout, erect, conical protuberance on the basal process of the prosternum and the anteriorly dilated sides of the prothorax. *A. dirus* has somewhat the facies of *Ganymela nitida*, Pasc., but it is closely related to *Madarus*.

1. *Acanthomadarus dirus*, sp. n. (Tab. XIX. figg. 16, 16 a, ♂.)

Cuneiform (♂) or oblong (♀), nigro-piceous or black, very shining. Head very sparsely, finely punctate, transversely grooved between the eyes; rostrum sparsely punctate, shallowly sulcate at the sides, a little smoother in the ♀, the antennae inserted at about the apical three-fifths, the joints of the funiculus stout and closely articulated, widening outwards, the club acuminate-ovate. Prothorax transverse, parallel at the sides to near the apex and then abruptly narrowed, the angle thus formed obliquely truncated or obtusely produced; the surface with very fine, widely scattered punctures. Elytra moderately long, concave and somewhat uneven on the disc, and more or less depressed along the suture, the subapical callosities prominent; very finely punctate-striate, the striae scarcely visible on the disc (the sutural one excepted), the interstices flat and with a few scattered excessively minute punctures. Pygidium densely punctate. Beneath sparsely punctate, the declivous portion of the prosternum with coarse foveiform impressions. Anterior tibiae sinuate within, strongly unguiculate at the outer apical angle and with a small tooth at the inner apical angle.

Length $6\frac{1}{2}$ – $7\frac{1}{2}$, breadth $2\frac{2}{3}$ – $3\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Tolé (*Champion*).

Three specimens: the two from Bugaba (♂ ?) have a broad, strongly transverse prothorax, with the swollen subapical lateral portion obliquely truncated; the one from Tolé (♀ ?) has a rather smoother rostrum, and a narrower, less transverse prothorax,

with the swollen subapical lateral portion produced into a stout tuberculiform prominence. It is hardly likely that the insects from these two localities belong to different species, and they are therefore treated as sexes of one, that from Bugaba being regarded as the type.

LOBODERES.

Loboderes, Schönherr, Gen. Curc. iii. p. 796 (1836); Lacordaire, Gen. Col. vii. p. 223.

Epilobaspis, Chevrolat, Ann. Soc. Ent. Fr. (5) vii. p. 101 (1877).

Schönherr included two species in this Tropical-American genus, and it is probable that various others are contained in collections, in addition to the three now added. The typical forms have the entire under surface densely flavo-squamose, and the antennæ of the male remarkably formed*. Lacordaire placed *Loboderes* amongst the "Eurhinides," but they are obviously nearly related to *Madarus*, from which they differ in their shorter and stouter rostrum, peculiarly formed male antennæ, and narrower form. The basal process of the prosternum is largely developed, covering the mesosternum, and it is on the same plane as the metasternum.

1. *Loboderes flavicornis*. (Tab. XIX. figg. 17, 17 *a*, *b*, ♂; 18, ♀.)

Loboderes flavicornis, Boh. in Schönh. Gen. Curc. iii. p. 798 (♂)¹; viii. 1, p. 274 (♂ ♀)²; Lacord. Gen. Col. vii. p. 223, nota³.

♂. Antennæ testaceous or rufo-testaceous, scape alutaceous and broadly dilated from near the base to the apex, joints 2-7 of the funiculus very short, widened, perfoliate, and closely setose, club oblong-ovate, flattened, strongly articulated, blunt at the tip (fig. 17 *b*).

♀. Antennæ piceous or black, club oblong-ovate (fig. 18).

Hab. MEXICO, Vera Cruz? (*coll. Solari*); BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, Livingston (*Schwarz and Barber, in U.S. Nat. Mus.*), Cahabon in Vera Paz (*Champion*); NICARAGUA, Chontales (*Belt*); PANAMA, Bugaba, Caldera (*Champion*). —BRAZIL^{1 2 3}.

Found in numbers at Cahabon and Bugaba. The male of this insect is easily recognizable by the extraordinary structure of the antennæ. The entire under surface is densely flavo-squamose in both sexes.

2. *Loboderes sulphureiventris*, sp. n. (Tab. XIX. figg. 19, 19 *a*, *b*, ♂.)

Oblong, subfusiform, robust, glossy-black; glabrous above, beneath (a space down the middle of the metasternum and abdomen, and the second ventral segment, excepted) densely clothed with small sulphur-yellow scales. Head finely punctate, transversely depressed between the eyes; rostrum very stout, curved, not longer than the prothorax, striate and closely punctate, the antennæ inserted near the tip in the ♂. Prothorax conical, as long as broad, closely, finely punctate. Elytra oblong-subtriangular, finely lineato-punctate, striate along the suture and at the sides, the interstices flat, sparsely, very

* The Brazilian genus *Loboderinus*, Solari, the type of which, *L. clavatus*, has an abnormally formed antennal club in the ♂ and the entire under surface densely flavo-squamose, does not seem to me to belong to this section, the basal process of the presternum being less developed, the scutellum large, free, and squamose, the tarsi slender and with narrowly lobed third joint, &c.

minutely punctate. Pygidium rugosely punctate, convex in the ♂. Prosternum obsoletely sulcate towards the apex, the basal process flattened and somewhat explanate laterally, feebly tuberculate behind each coxa, and emarginate behind.

♂. Antennæ (fig. 19 *a*) with the scape clavate at the apex (as in the ♀), joints 4–7 of the funiculus very short, widened, perfoliate, and setose, the club very large, flattened, oblong, and nearly as long as the funiculus; anterior tarsi hairy and slightly dilated; anterior tibiæ (fig. 19 *b*) obliquely truncate at the apex within, the claw very small; metasternum and abdomen sparsely squamose down the middle, the first ventral segment shallowly sulcate.

♀. Antennæ with a large acuminate-ovate club, the joints of the funiculus neither dilated nor setose; metasternum and abdomen sparsely punctate and glabrous down the middle.

Length 5–5 $\frac{3}{5}$, breadth 2–2 $\frac{2}{5}$ millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Belt*: ♀); PANAMA, Volcan de Chiriqui (*Champion*: ♂ ♀).

One male and two females. Very like the Brazilian insect identified by me as *L. citriventris*, Boh.; but differing from it in the perfectly conical prothorax, the large, oblong, flattened antennal club of the male, and the obliquely truncated apices of the anterior tibiæ in this sex.

3. *Loboderes crassirostris*.

Madarus crassirostris, Pasc. Ann. & Mag. Nat. Hist. (5) vi. p. 184¹.

Hab. NICARAGUA, Chontales¹.

The unique type of this insect is the female of a species of *Loboderes* with the greater part of the vestiture of the under surface abraded, the prosternum only bearing small yellow scales. The elytra are subtriangular, being more widened at the base than in the allied forms, and the interstices are somewhat closely, minutely punctate. The under surface is densely, finely punctate, the punctuation being very fine on the meso- and metasternal side-pieces. The basal portion of the prosternum is somewhat tumid, and arcuate-emarginate behind. The legs are clothed with very fine, hair-like, yellow scales. The antennal club is large, acuminate-ovate.

4. *Loboderes glabriventris*, sp. n. (Tab. XIX. figg. 20, 20 *a*, ♀.)

Oblong, robust, subfusiform, glossy-black; glabrous, a dense patch of small yellow scales at the sides of the third and fourth ventral segments excepted. Head minutely punctate, transversely depressed between the eyes; rostrum very stout, curved, about as long as the prothorax, sparsely punctate, striate at the sides, the antennæ inserted at about the middle, the antennal club very large, acuminate-ovate, nearly as long as the funiculus. Prothorax as long as broad, conical, feebly constricted in front; closely, very finely punctate. Elytra rapidly narrowing from the rounded humeri, finely lineate-punctate, the sutural and outer striæ only distinct, the interstices flat and with scattered very minute punctures. Pygidium large, rugosely punctate. Beneath coarsely, a broad space down the middle of the metasternum and abdomen sparsely and finely, punctate. Prosternum with a smooth triangular excavation at the apex, somewhat tumid along the middle, the basal process abruptly flattened, concave in the middle, almost smooth, and laterally margined, shallowly emarginate behind (fig. 20 *a*). Tibiæ without visible uncus at the tip.

Length 6 $\frac{1}{2}$, breadth 2 $\frac{1}{2}$ millim. (♀.)

Hab. NICARAGUA, Chontales (*Belt*).

One female. Very like the female of *M. sulphureiventris*, but with the under surface almost glabrous, and more coarsely and less densely punctate (the punctures on the mesosternal side-pieces large and scattered), the prosternum triangularly excavate at the apex, the antennal club larger and longer. Narrower than *L. crassirostris*, the intercoxal portion of the prosternum rather convex, the under surface more coarsely punctate, the pro-, meso-, and metasternum quite bare.

RADAMUS.

Radamus, Kirsch, Berl. ent. Zeitschr. 1875, p. 276.

Two species from Peru were referred to this genus by Kirsch, one of them being now known to extend into Central America. *Radamus* is very closely related to *Ampelogypter*, Lec., and both have basally connate tarsal claws; the prosternum, however, in the present genus is broadly flattened or concave down the middle, and shallowly sulcate or feebly bifoveate in front, and the basal process is greatly developed, so as to completely cover the mesosternum.

1. *Radamus atratus*. (Tab. XIX. figg. 21, 21 *a*, *b*, ♂.)

Radamus atratus, Kirsch, Berl. ent. Zeitschr. 1875, p. 277 (♀) ¹.

Ampelogypter nitidus, Solari, Ann. Mus. Genova, xlii. p. 428 (♂ ♀) (1906) ².

Hab. BRITISH HONDURAS, Belize (*Blancaneaux*); GUATEMALA, La Tinta, San Gerónimo, Zapote (*Champion*); NICARAGUA, Managua ² (*Solari*).—PERU ¹, Pozuzu.

In this insect the prosternum is narrowly and shallowly sulcate, or feebly bifoveate, near the apex and broadly hollowed in the middle, so that the basal portion appears to be transversely tumid. The rostrum is stout and strongly arcuate in the male, longer, smoother, straighter, and a little more slender in the female. The elytra are finely and strongly punctate-striate. The type of *R. atratus*, Kirsch, from Peru, is a large female of the species described by Solari, who has kindly lent me his types for examination. *R. æreus*, Kirsch, is larger than *R. atratus* and has the upper surface æneous.

AMPELOGLYPTER.

Ampelogypter, Leconte, Proc. Am. Phil. Soc. xv. p. 299 (Dec. 1876); Casey, Ann. N. York Acad. Sci. vi. pp. 466, 547.

This genus includes *Baridius ovalis*, Boh., and various other American forms nearly related to *Madarellus*, but with basally connate or subconnate tarsal claws. The prosternal excavation is deep and sharply defined, and the basal process is not sufficiently developed to completely cover the mesosternum. The meso- and metasternum are connate, and the faint transverse suture in *A. speculifer* is placed in a line with the

middle of the intermediate coxæ. The North-American species have more sharply striate elytra than those from the more southern localities. The Central-American representatives may be separated thus:—

- a.* Prosternal excavation oblong-trapezoidal, extending backward between the coxæ.
 - a*¹. Prothorax subconical *ovalis*, Boh.
 - b*¹. Prothorax with the sides subparallel at the base *sulcifrons*, sp. n.
- b.* Prosternal excavation oval, not extending backward between the coxæ.
 - c*¹. Body oval; elytra almost unimpressed on the disc, the humeri not prominent *speculifer*, Sol.
 - d*¹. Body subrhomboidal; elytra flattened, and with rather prominent humeri.
 - a*². Elytra faintly depressed at the base; head shallowly sulcate beneath. *binodosus*, sp. n.
 - b*². Elytra uneven; head deeply foveate beneath *plicatipennis*, sp. n.

1. *Ampelogypter ovalis*.

Baridius ovalis, Boh. in Schönh. Gen. Curc. viii. 1, p. 150¹.

Baridius inanis, Kirseh, Berl. ent. Zeitschr. 1875, p. 259².

Ampelogypter nicaraguensis, Solari, Ann. Mus. Genova, xlii. p. 430 (1906)³.

Hab. BRITISH HONDURAS, Rio Hondo (*Blancaneaux*: ♀); GUATEMALA, San Gerónimo (*Champion*: ♂); NICARAGUA, Managua³ (*Solari*: ♂).—COLOMBIA¹, Cartagena; PERU², Pozuzu.

I have seen the types of the species described by Boheman, Kirsch, and Solari, and am unable to separate them. The prosternal depression (into which the antennal club is received in repose) is broad and deep, and it extends backward between the coxæ as in the N.-American *A. ater* and *A. elongatus*, Lec. The elytra (and sometimes the prothorax also) are partly or almost entirely reddish-brown, and very finely striate, the sutural stria shallowly catenulate-punctate. The rostrum is stout and arcuate, longer in the female than in the male. The length varies from 2–3 mm.

2. *Ampelogypter sulcifrons*, sp. n.

Oblong, rather convex, very shining, black, glabrous. Head almost smooth, deeply, transversely sulcate between the eyes; rostrum stout, arcuate, scarcely so long as the head and prothorax, the basal portion sparsely punctate, the antennæ inserted at about the middle, the club rather large. Prothorax transverse, abruptly narrowed and tubulate in front, the sides rounded anteriorly and subparallel at the base; very sparsely, minutely punctate and with a row of coarser punctures along the basal margin. Elytra a little wider than the prothorax, transversely depressed at the sides below the humeri and beyond the middle; very finely striate, the striae faintly punctate, the interstices smooth. Pygidium transverse, short, finely punctate. Beneath sparsely punctured, the punctures coarse along the sides. Prosternum with an oblong-trapezoidal excavation extending backwards between the coxæ, which are separated by considerably more than their own width.

Length 2 $\frac{2}{5}$, breadth 1 $\frac{1}{8}$ millim. (♂.)

Hab. GUATEMALA, Chiacam in Alta Vera Paz (*Champion*).

One male. Smaller and much smoother than the N.-American *A. ater*, Lec., the anterior coxæ more widely separated, the prosternal excavation narrower, the antennal club larger.

3. *Ampelogypter speculifer*. (Tab. XIX. figg. 22, 22 *a*, ♂.)

Ampelogypter speculifer, Solari, Ann. Mus. Genova, xlii. p. 429 (1906) ¹.

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Teapa (*H. H. Smith*); BRITISH HONDURAS, Rio Hondo (*Blancaneaux*); GUATEMALA, San Gerónimo and San Juan in Vera Paz (*Champion*); NICARAGUA, Managua ¹ (*Solari*); COSTA RICA, Surubres (*Biolley*); PANAMA, Bugaba, Taboga I. (*Champion*).

The types of this species, like the various specimens found by myself in Panama, have the greater part of the under surface so densely punctate as to appear opaque, but in the four examples from "Mexico," Rio Hondo, and San Gerónimo the puncturing of this portion of the surface is more scattered and the narrow interspaces are shining. The prosternal excavation is deep and oval in shape, but it does not extend backward between the coxæ. The elytral striæ are a little more distinct than in *A. ovalis*.

4. *Ampelogypter binodosus*, sp. n.

Oblong-subrhomboidal, somewhat flattened above, very shining, black, glabrous. Head minutely punctate, transversely depressed between the eyes above and shallowly sulcate between them beneath; rostrum strongly arcuate, rather slender, considerably longer than the head and prothorax, the basal portion sparsely, finely punctate, the antennæ inserted behind the middle. Prothorax transverse, conical, constricted and tubulate in front; sparsely, minutely punctate. Elytra a little wider than the prothorax, subtriangular, transversely depressed below the base; finely punctate-striate, the striæ very faint, the interstices smooth. Pygidium transverse, small, densely punctulate. Beneath sparsely, rather finely punctate. Prosternum broadly flattened down the middle and with a deep oval fovea in front, the basal process sulcate and binodose. Tarsal claws connate at the base.

Length 3, breadth $1\frac{3}{4}$ millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One female. Smaller than *A. plicatipennis*; the elytra less uneven, with more distinctly punctate striæ, and the humeri not so prominent; the head not foveate beneath; the legs less elongate; the basal process of the prosternum distinctly binodose.

5. *Ampelogypter plicatipennis*, sp. n. (Tab. XIX. figg. 23, 23 *a*, ♀.)

Oblong-rhomboidal, somewhat flattened above, very shining, black, the antennæ rufescent at the base, glabrous. Head sparsely, minutely punctate, transversely depressed between the eyes above and deeply foveate between them beneath; rostrum rather slender, arcuate, considerably longer than the head and prothorax, the basal portion sparsely, finely punctate, the antennæ inserted at about the middle. Prothorax transverse, conical, abruptly constricted and tubulate in front; sparsely, minutely punctate. Elytra rather long, subtriangular, wider than the prothorax, transversely depressed before and behind the prominent humeri, at the sides beyond the middle, and before the apex, the suture also depressed anteriorly; faintly punctate-striate, the second stria almost obliterated below the base, the interstices

smooth. Pygidium densely punctate. Beneath sparsely punctate, the punctures coarse along the sides. Prosternum broadly flattened down the middle and with a deep oval fovea in front, the basal process shallowly sulcate and feebly binodose, not quite covering the mesosternum. Anterior coxæ separated by a little more than their own width. Legs rather elongate; tarsal claws subconnate at the base. Length $3\frac{2}{5}$ – $3\frac{1}{2}$, breadth $1\frac{7}{8}$ –2 millim. (♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

Two females. The subtriangular, uneven, faintly striate elytra, the deeply foveate infra-interocular portion of the head, the deep oval prosternal fovea, and the comparatively elongate legs distinguish *A. plicatipennis*.

SOLARIA, gen. nov.

Rostrum curved, as long as or longer than the head and prothorax, moderately stout or stout, sometimes with the apical portion more slender, longer, and straighter in the ♀; antennal club ovate, acuminate, pubescent; mandibles decussate; prothorax feebly or moderately constricted in front, deeply sinuate at the base, the median lobe rounded; scutellum very small, flat, transverse, triangular or rounded behind (*S. gibba*); elytra not or very little wider than the prothorax, narrowing from the rounded humeri; pygidium fully exposed, subvertical; prosternum at most shallowly sulcate, with two small oblong foveæ in front, unimpressed in *S. compressicollis*, the basal process large and broad, covering the mesosternum, and more or less arcuate-emarginate behind (fig. 26); anterior coxæ separated by more than their own width; ventral segments 1 and 2 connate at the middle, 1 not depressed in the ♂; femora dentate, the posterior pair sometimes unarmed (*S. compressicollis*); tarsal claws free; body oblong-subcuneiform, elliptic, or oval, almost glabrous.

Type, *S. acutidens*.

This genus includes *Baridius curtulus*, Boh., and *Onychobaris dentitibia* and *O. armipes*, Solari, and various closely allied forms. *O. punctatissima* and *O. nicaraguensis*, Solari, from Mexico and Nicaragua respectively, are more nearly related to *Onychobaris*, Lec., and will be dealt with later on. The numerous N.-American forms (which are mostly confined to Arizona and New Mexico) included under the last-mentioned genus by Casey have the basal process of the prosternum incompletely covering the mesosternum, the femora unarmed, and the surface of the body setulose above and beneath. *Solaria* is nearly related to *Madarellus* and *Radamus*, near which it must be placed. The five Central-American forms may be separated thus:—

- a. Prosternum faintly sulcate or bifoveate anteriorly; pygidium large; body oblong-subcuneiform or elliptic.
 - a¹. Anterior tibiæ very sharply dentate within in ♂, triangularly widened in ♀ *acutidens*, sp. n.
 - b¹. Anterior tibiæ sinuate within in both sexes.
 - a². Rostrum curved in ♂, longer and straighter in ♀ *curtula*, Boh.
 - b². Rostrum curved and about equal in length in the two sexes *curvata*, sp. n.
- b. Prosternum distinctly sulcate; pygidium short, strongly transverse; prothorax somewhat gibbous at the base; elytra uneven; anterior tibiæ almost straight within; body broad-ovate *gibba*, sp. n.

- c. Prosternum unimpressed, transversely tumid in middle in ♂; pygidium large; prothorax feebly tuberculate on each side of the disc and compressed [sp. n. at the sides anteriorly; elytra uneven; body somewhat fusiform. . . . *compressicollis*,

1. *Solaria acutidens*, sp. n. (Tab. XIX. figg. 24, 24 a, b, ♂; 25, ♀.)

Oblong, somewhat cuneiform, shining, black or fusco-castaneous. Head closely punctate, transversely grooved between the eyes; rostrum moderately stout, curved, a little longer than the head and prothorax, somewhat closely punctate, in the ♀ longer, smoother, and more slender, the antennæ inserted near (♂) or far behind (♀) the middle, the club small. Prothorax transverse, rather convex, narrow in front, the sides rounded anteriorly and subparallel behind; sparsely punctate, the punctures fine on the disc, becoming coarser and confluent at the sides. Scutellum minute, triangular. Elytra subtriangular, somewhat compressed at the sides behind the humeri, slightly depressed at the base and along the suture; sharply and narrowly punctate-striate, the interstices broad, flat, finely and shallowly uniseriate-punctate. Pygidium large, a little narrower in the ♀, densely punctate, longitudinally carinate at the base. Beneath closely and coarsely punctate along the sides, more sparsely and finely so down the middle, the fifth ventral segment densely punctate at the apex. Prosternum bifoveate in front, the broad basal process arcuate-emarginate behind. Femora sharply dentate, the tooth on the anterior pair triangular.

♂. Anterior tibiæ (fig. 24 b) armed with a long, sharp, triangular tooth at a little beyond the middle.

♀. Anterior tibiæ (fig. 25) triangularly dilated at a little beyond the middle.

Length $3\frac{1}{2}$ – $3\frac{3}{4}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba, Volcan de Chiriqui, Tolé (*Champion*).

Four males and two females. Distinguished from its Central-American allies by the very sharply dentate anterior tibiæ of the male, the tooth being longer and more acute than in the same sex of *S. dentitibia* (Solari), from the Amazons, which, moreover, has the rostrum shorter, more curved, and more closely punctate.

2. *Solaria curtula*. (*S. isthmia*, Tab. XIX. fig. 26.)

Baridius curtulus, Boh. in Schönh. Gen. Curc. viii. 1, p. 147¹.

Elliptic, somewhat flattened above, shining, black or piceous, the legs often reddish. Head closely punctate, transversely depressed between the eyes; rostrum moderately stout, about as long as the head and prothorax, closely punctate at the base and sparsely so towards the tip, the basal portion slightly thickened, the apical portion in the ♀ longer, straighter, smoother, and a little more slender, the antennæ inserted behind the middle in both sexes, the club rather small. Prothorax moderately convex, transverse, much narrowed and feebly constricted in front, the sides rounded anteriorly and parallel behind; closely, coarsely punctate (except along the smooth median line), the punctures becoming confluent at the sides and sometimes finer on the disc. Elytra narrowing from the rounded humeri, depressed along the suture; sharply punctate-striate, the interstices broad, flat, uniseriate-punctate, becoming rugose towards the sides. Pygidium densely punctate, large and rather convex in the ♂, narrower and flatter in the ♀. Beneath very coarsely and closely, a broad space down the middle sparsely and finely, punctate. Prosternum (fig. 26) flattened or slightly hollowed down the middle, with two short sulci or oblong foveæ in front, these being sometimes confluent. Anterior femora sharply, the others feebly, dentate. Anterior tibiæ simply sinuate within in both sexes.

Length $2\frac{1}{2}$ – $3\frac{1}{4}$, breadth $1\frac{2}{3}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. BRITISH HONDURAS, Belize, Rio Hondo (*Blancaneaux*); GUATEMALA, Livingston (*Schwarz and Barber, U.S. Nat. Mus.*), Chacoj, Polochic valley (*Champion*); NICARAGUA, Chontales, Greytown (*Janson*); PANAMA, Bugaba, Volcan de Chiriqui, Caldera, David, Tolé, San Feliz, Panama city, Taboga I. (*Champion*), La Chorrera (*Dolby-Tyler*).—COLOMBIA¹.

An abundant insect in the State of Panama, though we, unfortunately, have no note as to its habits. The chief characters of *S. curtula*, the type of which I have seen, are its coarsely punctured prothorax and the elongated, straighter, and more slender rostrum in the female. *S. armipes* (Solari), from Goyaz, Brazil, is a little broader than *S. curtula*, and has more sharply dentate femora, and a more abruptly curved, shorter rostrum in the male.

3. *Solaria curvata*, sp. n.

Very like the larger examples of *S. curtula*, but with the prothorax finely and sparsely punctate on the disc, and the elytra more finely striate and with the interstitial series of punctures finer and more scattered; the rostrum stout, strongly arcuate, and about equal in length, in the two sexes, the apical portion smooth and shining in the ♀; all the femora sharply dentate.

Length $3\frac{1}{3}$ – $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{5}{8}$ millim. (♂ ♀.)

Hab. GUATEMALA, Livingston (*Schwarz and Barber, U.S. Nat. Mus.*); PANAMA, Volcan de Chiriqui, Peña Blanca (*Champion*).

One male and five females. Apparently distinct from *S. curtula*, the difference in the form of the rostrum in the female being very marked. The shorter and more curved rostrum and the simply sinuate anterior tibiæ of the male separate *S. curvata* from *S. acutidens*; and the longer and less abruptly curved rostrum of the male, the more finely punctate upper surface, and the less strongly dentate femora distinguish it from *S. armipes*.

4. *Solaria gibba*, sp. n. (Tab. XIX. figg. 27, 27 a, ♂.)

Broad ovate, the prothorax somewhat gibbous at the base as seen in profile, varying in colour from black to ferruginous, shining. Head sparsely, finely punctate, shallowly, transversely grooved between the eyes; rostrum moderately stout, arcuate, not longer than the head and prothorax, finely punctate, the apical portion smoother in the ♀, the antennæ inserted at (♀) or slightly beyond (♂) the middle. Prothorax broad, strongly constricted in front, gradually narrowing from the base, the sides rounded anteriorly; sparsely, finely punctate (except along the narrow smooth median space), the punctures becoming longitudinally confluent at the sides. Scutellum almost smooth, flat, rounded behind. Elytra gradually narrowing from the rounded humeri, uneven; sharply striate, the striæ feebly punctate, the interstices broad, flat, and finely uniseriate-punctate. Pygidium closely punctate, short, strongly transverse. Beneath closely and coarsely, a broad space down the middle more sparsely and finely, punctate. Prosternum shallowly sulcate, feebly bifoveate in front. Legs rather stout, coarsely punctate; all the femora dentate; anterior tibiæ almost straight on their inner edge; anterior tarsi slightly widened in the ♂; tarsal claws small, free.

Length 3 – $3\frac{1}{4}$, breadth $1\frac{3}{4}$ – 2 millim. (♂ ♀.)

Hab. MEXICO, Temax in N. Yucatan (*Gaumer*); BRITISH HONDURAS, Rio Hondo (*Blancaneaux*); GUATEMALA, San Isidro, Pacific slope (*Champion*).

Five specimens. Broader than *S. curtula*, the prothorax somewhat gibbous at the base, the elytra uneven, the pygidium short and strongly transverse, the prosternum distinctly sulcate, the scutellum almost smooth and rounded behind.

5. *Solaria compressicollis*, sp. n. (Tab. XIX. figg. 28, 28 a, ♂.)

Somewhat fusiform, shining, rufo-piceous. Head finely punctate, transversely grooved between the eyes; rostrum stout, arcuate, a little longer than the head and prothorax, closely punctate, the antennæ inserted near the middle, the club rather large. Prothorax slightly broader than long, constricted in front, tumid on each side of the disc behind the middle, and laterally compressed and rapidly narrowed thence to the apex; rather coarsely, closely punctate (except along a narrow smooth median space), the punctures becoming confluent at the sides. Elytra subtriangular, uneven; narrowly, sharply striate, the striæ feebly punctate, the interstices broad, flat, feebly uniseriate-punctate, becoming rugulose towards the sides. Pygidium large, densely punctate. Beneath coarsely, a broad space down the middle more finely, punctate. Prosternum transversely tumid in the middle before the widely separated coxæ, unimpressed in front, the basal process moderately developed. Anterior femora sharply, the intermediate femora obsoletely, dentate.

Length $3\frac{1}{8}$, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. PANAMA, Caldera in Chiriqui (*Champion*).

One male. An isolated form, somewhat fusiform in shape, with a rather long, subconical, feebly binodose, laterally compressed prothorax, uneven elytra, and transversely tumid, unimpressed prosternum, the posterior femora unarmed.

Sect. EURHINIDES.

Eurhinides, Lacordaire (part.).

Under this section are included the various brilliantly metallic Tropical-American forms constituting the genus *Eurhinus*, Schönherr. *Loboderes* is here referred to the "Madarides" and *Barycerus* would be better placed amongst the "Baridiides vrais."

EURHINUS.

Eurhinus, Schönherr, Curc. Disp. Meth. p. 312 (1826); Gen. Curc. iii. p. 812, and viii. 1, p. 288; Lacordaire, Gen. Col. vii. p. 221.

The species of this genus seem to require a thorough revision, as they have been mainly based upon colour, and no allowance appears to have been made for any variation in this respect, this being particularly noticeable in the commonest of the Central-American forms*. The males have the funiculus sulcate along its lower

* In addition to the five species enumerated from within our limits, there are two specimens of an undescribed S.-American form in the British Museum labelled "*E. subcylindricus*, Chev., Mexico," which may be characterized thus:—*Eurhinus chevrolati*, sp. n. (Tab. XIX. figg. 29, 29 a, b, ♂.) Oval, shining, uniformly metallic-green or golden-green, the antennæ and tarsi bluish. Head impressed and foveate between the eyes, obsoletely punctate; rostrum short, not longer than the prothorax, sparsely, minutely punctate. Prothorax transverse, subconical, constricted in front; sparsely, minutely punctate. Scutellum transverse, triangular, hollowed in front. Elytra with the humeri rounded and not prominent; very finely striate throughout, the striæ finely punctate, the interstices sparsely, minutely punctate. Beneath very sparsely, minutely punctate. Anterior tibiae armed with a sharp tooth on the inner side near the apex. Anterior tarsi slightly dilated and hairy, the funiculus sulcate beneath, the first ventral segment broadly depressed, and the fifth without fovea, in the ♂. Length $6\frac{1}{2}$ –7, breadth $3\frac{5}{8}$ –4 mm. (♂ ♀).—*Hab.* SOUTH AMERICA, Colombia, Venezuela, Rio Negro (*Mus. Brit.*). Eight specimens, differing from *E. festivus* and its allies in its oblong form and the non-dilated humeri of the elytra. The MS. name *subcylindricus* is best ignored and the locality "Mexico" is more than doubtful.

face; the anterior tibiæ usually more or less elongated; the anterior tarsi dilated or lengthened; the first ventral segment depressed in the middle, and the fifth (except in *E. chevrolati*) furnished with a deep, transverse, piligerous fovea*. A fossil *Eurhinus* (*occultus*, Scudd.) has been described from the tertiaries of Colorado (Scudder, Bull. U.S. Geol. & Geogr. Surv. ii. p. 87).

Elytra distinctly striate, the transverse basal excavation extending outwards to the shoulder; body cupreous, the tarsi darker;

rostrum tuberculate at apex beneath in ♂ *atritarsis*, Chev.

Elytra obsoletely striate, the basal excavation not reaching the shoulder; rostrum not tuberculate beneath in ♂.

Body blue or bluish-green, the head, rostrum, femora, and tibiæ cupreous; the transverse basal depression of the elytra large.

cupripes, Pasc.

Body blue or bluish-green, the head, rostrum, and legs green; the transverse basal depression of the elytra foveate within;

anterior tarsi of ♂ elongated and dilated *viridipes*, sp. n.

Body uniformly green or golden-green; anterior tarsi of ♂ shorter and less dilated

festivus, F.

Body green, the disc of the prothorax, two patches on each elytron, rostrum, femora, and tibiæ cupreous

festivus, var. *magnificus*, Gyll.

Body green, the cupreous coloration of the elytra more extended, leaving the suture and base only green or golden-green . .

festivus, var. *suturalis*, Chev.

Body cupreous, the prothorax and elytra usually more or less suffused with æneous on the disc, the sutural stria rather coarsely punctate; fifth ventral segment foveate in both sexes

yucatecus, sp. n.

1. *Eurhinus atritarsis*. (Tab. XIX. figg. 30, 30 a, ♂.)

Eurhinus atritarsis, Chev. in Guérin's Icon. Règne Anim., Ins. p. 161¹.

Ceutorhynchus fulgidus, Sturm, in litt.²

Hab. MEXICO (*ex coll. Sturm; coll. Solari*), Vera Cruz (*Chevrolat*¹), Acapulco (*Höge*).

This species has the body and legs (the darker tarsi excepted) uniformly cupreous, and the elytra distinctly striate, and with the basal depression shallow and extending outwards to the humeri. The five males before me have the rostrum very stout and short, and armed with a small conical tubercle at the apex beneath; the femora more or less ciliate or pubescent beneath; the tibiæ armed with a sharp tooth near the tip, in addition to the apical uncus; the first ventral segment broadly depressed, and

* Divided into two in two South-American forms before me—*E. viridis*, Boh.?, from Brazil, and *E. malachiticus*, Kirsch, from Colombia, the type of which has been kindly communicated by Dr. Heller for examination.

the fifth furnished with a deep, transverse, piligerous fovea; and the joints 2-7 of the funiculus shallowly sulcate beneath, the outer ones very strongly transverse. *E. cupripes* (Illiger), from Brazil, is similarly coloured, except that the legs are wholly blue.

2. **Eurhinus cupripes.** (Tab. XIX. figg. 31, 31 *a*, *b*, ♂.)

Eurhinus cupripes, Pasc. Ann. & Mag. Nat. Hist. (5) xvii. p. 426¹.

Hab. MEXICO (*Mus. Brit.*), Puebla (*Sallé*).

I have seen four specimens of this species, including the type (♂), which may be known by its brilliant green or blue body, with cupreous head, rostrum, femora, and tibiæ, and the broad, deep, transverse excavation at the base of each elytron. The male characters are similar to those of *E. festivus* and its varieties.

3. **Eurhinus viridipes**, sp. n. (Tab. XIX. figg. 32, 32 *a*, *b*, ♂.)

Rhomboidal, robust, very shining, above blue or bluish-green, beneath in great part and the legs and rostrum (except sometimes at the tip) green, the antennæ æneous. Head very sparsely, minutely punctate, transversely depressed and shallowly foveate between the eyes; rostrum stout, curved, as long as the head and prothorax, somewhat closely punctate, the antennæ inserted beyond the middle. Prothorax transverse, rather convex, subconical, abruptly narrowed and tubulate in front; sparsely, minutely punctate. Scutellum short, broad, rounded behind. Elytra subtriangular, excavate and foveate at the base of the third stria, the humeri swollen and subangularly dilated; very finely seriate-punctate, striate at the base, apex, sides, and near the suture. Pygidium closely punctate. Beneath very sparsely punctate, the sides of the pro-, meso-, and metasternum almost smooth.

♂. Joints 2-7 of the funiculus sulcate beneath; anterior tibiæ elongate, somewhat curved, and with the subapical tooth small; intermediate tibiæ angularly dilated on the inner edge near the base; anterior tarsi elongated, with joints 2 and 3 strongly dilated and hairy, 3 very large; first ventral segment depressed in the middle and the fifth with a large, transverse, piligerous fovea.

Length $7\frac{1}{2}$ - $9\frac{1}{2}$, breadth (at shoulders) $4\frac{4}{5}$ - $6\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Cuernavaca (*Sallé*, *Höge*), Panislahuaca (*Sallé*), Tehuantepec (*Mus. Brit.*).

Nine specimens. Extremely like large, typical *E. festivus*, but with the upper surface blue or bluish-green, and the anterior tarsi of the male longer and much more dilated. From *E. cupripes*, which has a similarly-coloured body, it may be distinguished by the shallower and less transverse excavation at the base of the elytra, and the green head, rostrum, and legs. The S.-American *E. cyaneus*, Gyll., is also very similar to *E. viridipes*, but it is entirely blue, above and beneath, and has a deeper and larger basal fovea on the elytra.

4. **Eurhinus festivus.** (Tab. XIX. figg. 33, 34, 35, ♂.)

Rhynchaenus festivus, Fabr. Syst. Eleuth. ii. p. 445¹; Oliv. Ent. v. no. 83, p. 119, t. 29. fig. 436².

Eurhinus festivus, Gyll. in Schönh. Gen. Curc. iii. p. 815³; Boh. op. cit. viii. 1, p. 289⁴.

Hab. MEXICO (*Mus. Brit.*), Acapulco (*Höge*); BRITISH HONDURAS, Belize, Rio Hondo

(*Blancaneaux*); GUATEMALA, Panzos (*Champion*); COSTA RICA (*Van Patten*), Caché (*Rogers*), Tuis, San José (*Pittier*).—SOUTH AMERICA¹, Surinam^{2 3 4}, Cayenne^{2 3 4}; CUBA⁴.

Var. *α*. The prothorax with a triangular patch on the disc (of variable extent and sometimes wanting), the elytra with a patch on each shoulder and another at the apex, the rostrum, femora, and tibiae, and sometimes the head also, cupreous or golden. (Fig. 34.)

Eurhinus magnificus, Gyll. in Schönh. Gen. Curc. iii. p. 814⁵; op. cit. viii. 1, p. 289⁶.

Hab. MEXICO^{5 6} (*Mus. Brit.*; *Truqui*), Almolonga in Puebla, Tapachula in Chiapas (*Höge*), Cordova, Millan (*Knab*, in *U.S. Nat. Mus.*), Bobo (*Flohr*), Jalapa (*Smith*), Vera Cruz, Toxpan, Panistlahuaca in Oaxaca (*Sallé*), Teapa (*Sallé*, *H. H. Smith*), Tehuantepec (*Mus. Brit.*); BRITISH HONDURAS, Rio Sarstoon, Rio Hondo (*Blancaneaux*); GUATEMALA, Panzos (*Champion*, *Conradt*), Trece Aguas (*Schwarz and Barber*, *U.S. Nat. Mus.*), San Gerónimo, Teleman, El Reposo (*Champion*); NICARAGUA, Chontales (*Belt*, *Janson*).

Var. *β*. The cupreous patches on the elytra longitudinally confluent and sometimes suffused with blue, leaving the suture and base only green or golden-green. (Fig. 35.)

Eurhinus suturalis, Chevr. in Guérin's Icon. Règne Anim., Ins. p. 160⁷.

Eurhinus magnificus, var. *β*, Boh. in Schönh. Gen. Curc. viii. 1, p. 289⁸.

Hab. MEXICO⁸ (*Sallé*, *Mus. Brit.*), Ventanas in Durango (*Forrer*), Tonila in Colima, Almolonga in Puebla (*Höge*), Tampico⁷.

A very variable insect. The var. *magnificus*, the predominant Central-American form, does not extend south of Nicaragua, and the var. *suturalis* is confined to Central and Northern Mexico; but amongst the Costa Rican series, which are mostly wholly green, like the typical S.-American *E. festivus*, there are several specimens showing traces of the cupreous spots on the elytra, so that no value can be placed on this character. A few small examples from Teapa, British Honduras, and the Polochic valley (both with and without the cupreous spots) have the side-pieces of the meso- and metasternum rather coarsely punctate, and the elytral interstices more distinctly punctured than usual towards the apex. The elytra are deeply excavate and foveate at the base, and the humeri are more or less angularly dilated. The males have the outer joints of the funiculus strongly transverse, and 2–7 sulcate beneath, the anterior tibiae slightly elongated, the first ventral segment depressed in the middle and the fifth furnished with a deep, transverse, piligerous fovea near the apex. The females have a smoother rostrum, a more slender funiculus, and the anterior tibiae shorter and more distinctly crenulate within; the fifth ventral segment is sometimes obsoletely foveate in this sex. The form of the var. *suturalis* with a bluish suffusion on the cupreous portions of the upper surface, from Tonila and Ventanas, is perhaps the most brilliantly-coloured Barid yet discovered.

5. *Eurhinus yucatecus*, sp. n. (Tab. XIX. figg. 36, 36 a, ♂.)

Rhomboidal, robust, very shining, cupreous, the antennæ, the disc of the prothorax, the elytra (except along the suture, base, and outer margin), and sometimes the under surface and legs also, indeterminately suffused with æneous or greenish-æneous. Head sparsely, finely punctate, depressed between the eyes; rostrum very stout, arcuate, about as long as the head and prothorax, somewhat closely punctate, the antennæ inserted beyond the middle. Prothorax transverse, convex, conical, narrow and tubulate in front; sparsely, finely punctate, and with a line of punctures along the basal margin. Scutellum strongly transverse, triangular, very sparsely punctate. Elytra triangular, excavate and foveate at the base of the third stria, the humeri thickened and subangularly dilated; seriate-punctate, striate at the base, apex, and sides, the sutural stria also distinct and with a row of rather coarse punctures, the interstices flat, very sparsely, finely punctate. Pygidium closely punctate. Beneath coarsely, the abdomen more finely, punctate. Tibiæ more or less crenulate within, each armed with a sharp tooth on the inner side towards the apex.

♂. Anterior tibiæ a little elongated; anterior tarsi slightly dilated and somewhat hairy, the third joint large; metasternum and first ventral segment excavate in the middle, the fifth segment with a transverse piligerous fovea; joints 2-7 of the funiculus rather broad, shallowly sulcate beneath.

♀. Anterior tibiæ shorter; ventral depressions shallower, the fifth with a smaller fovea; funiculus more slender.

Length $4\frac{1}{2}$ – $5\frac{1}{2}$, breadth (at shoulders) $2\frac{5}{8}$ – $3\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Temax in N. Yucatan (*Gaumer*).

Sent us in numbers by Gaumer, many of the specimens in a bad state of preservation*. This is the Yucatan form of the variable *E. festivus*, from which it may be known by its different colour and the more coarsely punctate sutural stria of the elytra. The ventral fovea is constantly present in the female, and the excavation of the male is deep.

Sect. BARIDES.

Baridiides vrais, Lacordaire, Gen. Col. vii. p. 224.

The species of this section, two genera only of which were recognized by Lacordaire, have a fully exposed vertical or subvertical pygidium in both sexes† (usually larger and more convex in the male than in the female), and the mesosternum not wholly covered by the basal process of the prosternum. The N.-American forms have been placed under numerous genera by Casey, many of these being represented within our limits. The male-characters are feeble, as compared with those of the Centrinides, and the prosternum is very rarely spinose‡. *Pseudobaris*, Lec., includes some of the most abundant of the Central-American Barids.

EURHINOPSIS, gen. nov.

Mandibles decussate; rostrum curved, stout, very short, the antennæ inserted at about the middle, rather slender, the joints of the funiculus closely articulated, widening outwards, the club ovate; prothorax

* Due to having been baked to prevent mould.

† Except in the female of *Pseudobaris lucida*, in which it is subhorizontal and almost hidden by the elytra.

‡ In some of the S.-American species of the genus *Anopsilus*, Kirsch (= *Balbus*, Pasc.).

transverse, shortly tubulate in front, deeply bisinuate at the base; scutellum free, triangular, on the same plane as the elytra; elytra short, rounded-triangular, separately rounded at the apex; pygidium exposed, transverse, subvertical; prosternum deeply sulcate to near the base, the anterior portion short, the broad basal process almost covering the mesosternum; anterior coxæ separated by about their own width; legs short and stout, femora linear and unarmed, tibiæ strongly unguiculate and also toothed at or near the inner apical angle (fig. 2 *b*), tarsal claws small and connate; body short and broad, rhomboid-ovate, metallic, glabrous.

Type, *E. æruginosus*.

The two species referred to this genus differ from *Eurhinus* (type, *E. cyaneus*, Gyll.) in their very short rostrum, prosternum, and legs, more slender antennæ, non-prominent humeri, smaller tarsal claws, &c.; and they cannot even be satisfactorily placed in the section "Eurhinides" as defined by Lacordaire. *Eurhinopsis* will probably include various unnamed S.-American forms existing in collections.

1. *Eurhinopsis æruginosus*, sp. n. (Tab. XX. figg. 1, 1 *a*, ♀.)

Convex, subopaque above, shining beneath, metallic green, the femora and tibiæ cupreous, the tarsi and antennæ nigro-piceous. Head finely punctate, foveate between the eyes; rostrum feebly curved, very short, not longer than the prosternum along the median line, sparsely, finely punctate. Prothorax transversely convex, arcuately narrowing from the base to the apical constriction; closely and uniformly impressed with coarse, rounded punctures, which are separate one from another. Elytra depressed along the suture, the humeri rounded; sharply punctate-striate, the interstices flat and coarsely, closely, seriatly punctate. Pygidium closely punctured. Beneath very coarsely and closely, the median portion of the ventral segments sparsely and much more finely, punctate. Legs coarsely, closely punctate, Length $3\frac{1}{2}$, breadth $2\frac{1}{8}$ millim. (♀.)

Hab. MEXICO, Oaxaca (*Höge*).

One specimen. The upper surface in this insect is very finely alutaceous, thus appearing subopaque.

2. *Eurhinopsis viridicolor*, sp. n. (Tab. XX. figg. 2, 2 *a*, *b*.)

Broad, somewhat flattened above, shining, golden-green, the antennæ and tarsi nigro-piceous. Head finely punctate, foveate between the eyes; rostrum arcuate, very stout, about as long as the prosternum along the median line, sparsely, finely punctate. Prothorax moderately convex, gradually narrowing from the base to the abrupt apical constriction; sparsely, finely punctate, the punctuation becoming coarser towards the sides. Elytra slightly flattened on the disc, sharply, finely striate, the striæ with scattered conspicuous punctures, the interstices broad, flat, and very finely and sparsely seriate-punctate. Pygidium closely punctate. Beneath very coarsely and closely, the median portion of the ventral segments sparsely and more finely, punctate.

Length $3\frac{1}{10}$ – $4\frac{1}{10}$, breadth 2 – $2\frac{3}{8}$ millim.

Hab. GUATEMALA, Panima in Vera Paz (*Champion*); PANAMA (coll. *Fry*, in *Mus. Brit.*).

Two specimens, perhaps male and female, varying in size and in the sculpture of the prothorax. Broader, less convex, and more finely and sparsely punctured above than *E. æruginosus*, the upper surface shining golden-green, the femora and tibiæ similarly coloured, the prothorax abruptly constricted in front. *Eurhinus malachiticus*, Kirsch,

from Colombia, the type of which I have seen, is not unlike the present insect, but it is congeneric with *E. cyaneus*, Gyll.

STETHOBAROIDES, gen. nov.

Mandibles decussate; rostrum arcuate, moderately long, the antennæ inserted behind the middle, the club acuminate-ovate; prothorax transverse, subconical, abruptly constricted and tubulate in front, feebly bisinuate at the base, the median lobe emarginate; scutellum free, oblong, narrow, parallel-sided; elytra rounded-triangular, with obliquely truncated humeri, leaving the upper portion of the mesothoracic epimera exposed, sharply crenate-striate, separately rounded at the apex; pygidium exposed, transverse, subvertical; prosternum (fig. 3*b*) deeply sulcate, the sulcus widening to the anterior coxæ, and then narrowed and margined between them, the basal process short; anterior coxæ separated by about one-half, and the intermediate and posterior coxæ by nearly twice, their own width; mesosternum depressed, exposed, connate with the metasternum; ventral segments 1 and 2 connate in their median third; femora sublinear, unarmed; tibiæ strongly unguiculate; tarsal claws minute, narrowly separated; body sub-rhomboidal, flattened and glabrous above.

Type, *S. nudiventris*.

A genus including two closely allied species. The type superficially resembles the North-American *Stethobaris ovata*, Lec.*, but differs from it in the fully exposed pygidium, the more approximate anterior coxæ, the long, parallel-sided scutellum, the obliquely truncated humeri, the less elongate antennal club, &c.

1. *Stethobaroides nudiventris*, sp. n. (Tab. XX. figg. 3, 3*a*, *b*, ♂.)

Black, shining, the elytra very finely alutaceous. Head finely punctate, shallowly transversely grooved or feebly foveate between the eyes; rostrum in the ♂ moderately stout, about as long as the head and prothorax, and closely striato-punctate to the tip, in the ♀ longer, smoother, and more slender, the antennæ inserted just behind the middle in the ♂ and at the basal third in the ♀. Prothorax strongly transverse, rapidly narrowed from the base; somewhat closely punctate, except along the median line, the punctures fine on the disc and coarse at the sides. Scutellum smooth, canaliculate. Elytra depressed along the suture, the crenate striæ deep and sulciform, the interstices flat, broad on the disc, narrower at the sides, and obsoletely seriate-punctate. Beneath almost glabrous, coarsely and closely, the ventral segments 1-4 very sparsely and finely, punctate.

♂. Metasternum broadly excavate, and the first ventral segment slightly depressed, in the middle, and the fifth segment usually with a deep central fovea.

Length $2\frac{7}{8}$ - $3\frac{1}{2}$, breadth $1\frac{1}{2}$ - $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*; *Mus. Dresden*); BRITISH HONDURAS, Belize, Rio Hondo (*Blancaneaux*).—COLOMBIA (*Mus. Brit.*).

Numerous examples, one of the males wanting the fovea on the fifth ventral segment.

2. *Stethobaroides piliventris*, sp. n. (Tab. XX. figg. 4, 4*a*, ♂.)

♂. Very like *S. nudiventris*, but larger and more elongate; the rostrum more elongate (as long as in the ♀ of *S. nudiventris*); the prothorax very sparsely and minutely punctate on the disc; the elytra relatively longer, more gradually narrowed from the base, transversely depressed on the disc at a little beyond the

* *Elliptobaris nudicollis* (antea, p. 251) is not unlike *S. ovata*, but it has long, divergent tarsal claws, setulose elytra, &c.

middle, the dorsal interstices wider; the metasternum and abdomen with a broad space down the middle closely, finely punctate and clothed with long, fine hairs, the metasternum and first segment broadly and deeply excavate, the fifth foveate.

Length $4\frac{1}{3}$, breadth $2\frac{1}{3}$ millim.

Hab. MEXICO, Juquila in Oaxaca (*Sallé*).

One male.

ANISORRHAMPHUS, gen. nov.

Rostrum stout, arcuate, moderately long, separated from the head by a transverse groove, and also abruptly constricted near the base (the constriction formed by a deep transverse groove and a subtriangular excavation on each side), the scrobes deep, inferiorly placed, confluent behind; antennæ inserted beyond the middle of the rostrum, the club large and ovate; eyes large; mandibles short, notched within, slightly decussate; prothorax transverse, bisinuate at the base, the median lobe truncate; scutellum free, triangular, densely squamose; elytra rounded-triangular, separately rounded at the apex, sharply striate, the lower margin strongly sinuate; pygidium large, fully exposed, declivous; prosternum unimpressed behind the transverse suture; anterior coxæ separated by about half their own width, the basal process emarginate and not covering the mesosternum; metathoracic episterna broad; ventral segments 2-5 nearly equal in length; femora unarmed, clavate; tarsal claws long, divergent; body oblong-rhomboidal, polished and in great part glabrous above, the scutellum and under surface squamose.

Type, *A. squamiventris*.

This genus may be at once recognized by the peculiar fractured appearance of the rostrum (fig. 5 *a*), due to the deep transverse sulcus on each side near the base, the subtriangular excavation behind this looking as if it was intended to receive the basal joint of the funiculus. *A. squamiventris* has the general facies of *Loboderes flavicornis*, and it inhabits the same districts in Central America.

1. *Anisorrhampus squamiventris*, sp. n. (Tab. XX. figg. 5, 5 *a*, ♂.)

Black, shining, the tip of the rostrum, the antennæ in part or entirely, and the tibiæ and tarsi, ferruginous or obscure ferruginous; the scutellum and under surface densely clothed with rather coarse whitish or pale ochreous scales. Head closely punctate; rostrum about as long as the head and prothorax, very stout, closely punctate, and setose beneath in the ♂, more slender and bare in the ♀, the antennæ inserted towards the tip in the ♂ and at about the apical third in the ♀. Prothorax gradually narrowing from the base, feebly constricted in front; closely, somewhat coarsely punctate, and with indications of a smooth median line. Elytra rather short, rapidly narrowing from the rounded humeri, depressed along the suture to the apex; sharply punctate-striate, the interstices broad, flat, and very sparsely, finely punctate. Pygidium densely punctate, somewhat convex. Beneath densely punctate, the first ventral segment unimpressed in the ♂.

Length $2\frac{3}{8}$ - $4\frac{1}{8}$, breadth $1\frac{1}{4}$ -2 millim. (♂ ♀.)

Hab. MEXICO, Vera Cruz (*Sallé*); BRITISH HONDURAS (*Blancaneaux*); GUATEMALA, Cahabon, Chiacam, and Panzos in Alta Vera Paz (*Champion*), Coban (*Conradt*); PANAMA, Caldera in Chiriqui (*Champion*).

Found in numbers at Cahabon in February, 1880. The specimens before me vary greatly in size and also in the intensity of the puncturing of the prothorax.

MADAROPSIS, gen. nov.

Mandibles short, notched within, decussate; rostrum stout, strongly arcuate, moderately long, the scrobes running along the lower face, the antennæ inserted beyond or near the middle, the antennal club atout, ovate; prothorax constricted in front, moderately sinuate at the base; scutellum small, free, oblong; elytra elongate-subtriangular, slightly wider than the prothorax, produced and separately rounded at the apex, the humeri rounded, leaving the upper portion of the mesothoracic epimera exposed; pygidium prominent, transverse; prosternum (fig. 6*b*) narrowly sulcate from the apex to as far as the middle of the anterior coxæ, the sulcus widening anteriorly and limited on each side in front by a short oblique ridge, the basal process short and depressed; meso- and metasternum connate, the mesosternum depressed and broadly exposed; anterior coxæ separated by about their own width; legs moderately elongate; femora unarmed, the anterior pair subclavate, the others sulcate beneath; tibiæ and tarsi rather slender, the tibiæ strongly unguiculate, the tarsal claws long and divergent; body elongate, subfusiform, squamose.

Type, *M. sulcipectus*.

The insect forming the type of this genus superficially resembles certain members of the genus *Madarus* (*M. fusiformis* and *M. ochreoguttatus*), but the structure of the pro- and mesosternum is wholly different, and the two genera cannot even be placed in the same section of the Barina.

1. *Madaropsis sulcipectus*, sp. n. (Tab. XX. figg. 6, 6*a*, *b*, ♂.)

Shining, æneo-piceous; sparsely clothed with coarse, narrow, elongate, adpressed ochreous scales, those on the elytra here and there clustered into dense fascicles, the legs with small hair-like scales. Head finely punctate; rostrum about as long as the head and prothorax, closely punctate, the antennæ inserted at the apical third (♂) or near the middle (♀). Prothorax transverse, the sides rounded anteriorly and parallel behind; closely and rather coarsely punctate, except along the irregular narrow smooth median space. Elytra flattened on the disc anteriorly, rapidly narrowed in their apical fourth; finely striate, the striæ with scattered fine punctures, the interstices flat to near the apex, sparsely, finely, irregularly punctate. Pygidium (♂) convex, shining, and densely punctate, (♀) shorter, flatter, rugosely punctate, and raised along the middle. Beneath coarsely and closely, the ventral segments very sparsely and finely, punctate.

Length $4\frac{1}{10}$ — $4\frac{1}{2}$, breadth $1\frac{4}{5}$ —4 millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

Three specimens. Easily recognizable by its elongate, subfusiform shape, the æneo-piceous surface, the dense fascicles of coarse, narrow, ochreous scales on the elytra, the narrowly sulcate prosternum, the long legs, and the slender tarsi.

SPHENOBARIS, gen. nov.

Mandibles not decussate, almost straight on their inner edge (as seen closed), rounded externally; rostrum arcuate, moderately long, the antennæ inserted at the middle, the funiculus stout, the club ovate; prothorax broad, feebly bisinuate at the base; scutellum small, transverse; elytra triangular, scarcely wider than the prothorax, conjointly rounded at the apex, the humeri rounded, leaving the upper portion of the mesothoracic epimera exposed; pygidium exposed, vertical, short, strongly transverse; prosternum flat, obsoletely bifoveate in the transverse subapical groove, the basal process broadly truncate behind and almost on a level with the connate, flattened portions of the meso- and metasternum; anterior and intermediate coxæ each separated by more than their own width; legs moderately long; femora sub-

clavate, the anterior and intermediate pairs dentate; tibiae feebly unguiculate; tarsal claws divergent; body cuneiform, flattened and opaque above, squamose.

Type, *S. quadridens*.

The single species referred to *Sphenobaris* is not unlike a *Madarellus* in general facies (except that it has the upper surface opaque and squamose, instead of polished and bare), but as the transverse flattened portion of the mesosternum is fully exposed, the genus seems best placed among the "Baridiides vrais." The prothorax is much more feebly sinuate at the base than in *Madarellus*, *Radamus*, and *Ampelogypter*.

1. *Sphenobaris quadridens*, sp. n. (Tab. XX. figg. 7, 7 a.)

Moderately elongate, alutaceous and opaque above, somewhat shining beneath, piceous; clothed with widely scattered, intermixed, coarse, narrow, oblong, ochreous and minute darker scales, the larger ochreous scales on the elytra condensed into two small spots at the base and a dense angulate median fascia, and those on the metathoracic episterna into a dense elongate patch, the head and base of the restrum also somewhat thickly squamose, the legs with small hair-like ochreous scales. Head closely punctate; rostrum about as long as the head and prothorax, moderately stout, densely punctate and finely carinate, bare, shining, and almost smooth at the tip. Prothorax transverse, narrow and feebly constricted in front, the sides rounded anteriorly and parallel at the base; densely, finely punctate, except along the faint median line, the very narrow interspaces becoming obliquely confluent towards the sides. Elytra transversely depressed at the middle, very finely punctate-striate, the interstices broad, flat, densely rugulose, shallowly uniseriate-punctate near the suture. Beneath coarsely and densely, the abdomen sparsely and finely, punctate. Anterior tibiae sinuate, widened in their outer half.

Length 3, breadth $1\frac{1}{3}$ millim. (♀?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen in very fresh condition.

DEIPYLE, gen. nov.

Mandibles curved, toothed within, slightly decussate at the tip; rostrum curved, stout, elongate, the antennae inserted at or slightly behind the middle, the antennal club acuminate-ovate; prothorax subconical, transverse, tubulate in front, strongly bisinuate at the base, the median lobe rounded and impinging on the scutellum, the latter small and transverse; elytra rounded-triangular; pygidium exposed, vertical, not visible from above, transverse, dissimilar in size in the two sexes of *D. induta*; prosternum (fig. 8 b) with a broad polished sulcus extending from the apex to as far as the middle of the widely-separated anterior coxae, the ante-coxal portion short, not longer than the broadly truncated basal process; mesosternum depressed, connate with the metasternum; femora sublinear, unarmed; tibiae strongly unguiculate; tarsal claws long, divergent; body rhomboid-ovate, short, sparsely squamose.

Type, *D. induta*.

The type of *Deipyle* looks like a Centriniid, at first sight, but it has a vertical and fully exposed pygidium in both sexes, and is perhaps best placed near *Glyptobaris*, Casey. *D. seminuda* may be included under the same genus for the present.

1. *Deipyle induta*, sp. n. (Tab. XX. figg. 8, 8 a, b, ♀.)

Rhomboid-ovate, rather convex, shining, rufo-piceous, variegated above with black; the upper surface somewhat thickly clothed with long, coarse, hair-like, ochreous scales, which are transversely arranged on the prothorax and tend to form a basal and median fascia and various interrupted lines on the elytra, the vestiture of the under surface much sparser and finer. Head densely punctate rostrum

stout, longer than the head and prothorax, moderately curved, somewhat closely punctate, the apical half a little more sparsely punctured in the ♀. Prothorax rapidly narrowing from the base, densely, finely, confluent punctate, and sometimes with an abbreviated smooth median line. Scutellum hollowed in the middle. Elytra sharply, narrowly striate, the striae faintly punctate, the interstices flat, rugosely punctate, and with a very fine, more or less distinct, raised line on each side. Pygidium broad, rather convex, and closely punctate in the ♂, smaller, flattened, and rugosely punctured in the ♀. Beneath coarsely and densely, the abdomen very sparsely and finely, punctate, the prosternal cavity sharply defined and almost smooth.

Length $3\frac{1}{2}$ – $4\frac{1}{8}$, breadth 2 – $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, San Isidro, Pacific slope (*Champion*: ♂ ♀); PANAMA, Volcan de Chiriqui (*Champion*: ♀).

Five specimens, the one with the larger pygidium and more closely punctate rostrum assumed to be the male*, the two from Chiriqui in very fresh condition. The elytra are bare in places, the ochreous hair-like vestiture thus forming fasciae and interrupted lines.

2. *Deipyle seminuda*, sp. n. (Tab. XX. figg. 9, 9 a, ♀.)

Rhomboid-ovate, short, feebly convex above, very shining, rufo-piceous; the upper surface clothed with a few small, hair-like, yellowish-white scales, those on the elytra condensed into two faint interrupted fasciae (one basal, the other median), the under surface almost bare. Head closely punctate, obsoletely foveate; rostrum arcuate, moderately stout, much longer than the head and prothorax, sparsely punctate, a little smoother in the ♀. Prothorax rapidly narrowing from the base, sparsely, minutely punctate (except along the smooth median line), the punctures becoming coarser at the sides and along the basal margin. Elytra short, narrowly crenate-striate, the interstices broad, flat, obsoletely seriato-punctate, feebly costate towards the sides and apex. Pygidium very short, closely punctate. Beneath coarsely and closely, the abdomen and the median portion of the prosternum very sparsely and finely, punctate. Anterior coxae rather small, separated by more than their own width. Legs slender.

Length $2\frac{3}{5}$, breadth $1\frac{3}{8}$ millim. (♂ ♀.)

Hab. PANAMA, Bugaba (*Champion*).

One pair, the male partially abraded. Shorter, smaller, and smoother than *D. induta*, the vestiture very sparse and fine, the under surface almost bare, the anterior coxae smaller and more widely separated, the pygidium very short and inconspicuous, the legs more slender.

GLYPTOBARIS.

Glyptobaris, Casey, Ann. N. York Acad. Sci. vi. pp. 466, 520 (1892).

This well-defined genus includes *Baridius (Calandra) lituratus*, F., from S. America, *B. rugatus*, Boh., from Mexico, *B. rugicollis* and *B. evulsus*, Kirsch, from Colombia, and *Onychobaris rugicollis*, Lec., from N. America, the last-mentioned insect (the specific name of which proves to be preoccupied) forming Casey's type. The different species are very closely allied and variable, and they are by no means easy to distinguish. The males have two transversely-placed tubercles on the basal portion

* The sexes of the Palearctic *Baris spoliata*, Boh., differ in the same way in the form of the pygidium.

of the prosternum in a line with the posterior margin of the anterior coxæ, the first ventral segment slightly flattened or depressed in the middle, and the rostrum usually a little more distinctly punctured at the apex than in the females. In one of the new forms now added, *G. spinigera*, the median carina of the prothorax in the fully-developed male is produced into a long, stout, smooth, spiniform process, which covers the scutellum and extends some distance along the suture; and in another, *G. simplex*, the coarse punctures on the prothorax are rounded and not confluent. The prosternal depression is triangular, opaque, and flattened at the bottom, extending narrowly backward between the coxæ and becoming confluent anteriorly with the two widely-separated subapical foveæ; the pygidium is vertical, very short, not visible from above; and the mandibles do not overlap at the apex when closed. The species known to me may be separated thus:—

- a.* Prothorax coarsely, rugosely punctate, the narrow raised interspaces longitudinally or sinuously confluent.
 - a*¹. Elytra with finely punctured striæ, the dorsal interstices confusedly punctate at the base, the outer ones narrowly, interruptedly costate; rostrum carinate at the base.
 - a*². Median carina of the prothorax not produced in the ♂; elytra more uneven and with the vestiture sparser and more scattered . . . *rugata*, Boh.
 - b*¹. Median carina of the prothorax produced posteriorly into a long stout spine in the fully-developed ♂; elytra less uneven, with the vestiture more crowded on the basal half *spinigera*, sp. n.
 - b*¹. Elytra with more coarsely punctured or deeper striæ, the interstices uniseriate-punctate, the outer ones narrowly, uninterruptedly costate, the surface flattened, with very sparse vestiture.
 - c*². Prothorax obliquely narrowed, very coarsely sculptured; elytra shining, the interstices with coarse scattered punctures *solarii*, sp. n.
 - d*². Prothorax rounded at the sides, less coarsely sculptured; elytra dull, the interstices with closely placed punctures [*rugicollis*, Kirsch.]
- b.* Prothorax less coarsely punctate, the raised lines more closely placed; elytra flattened, with finely punctured striæ, the dorsal interstices confusedly punctate at the base, the outer ones faintly costate . . . *lecontei*, n. n. (*rugicollis*, Lec.).
- c.* Prothorax shallowly punctate, the raised sinuous lines fine and closely placed.
 - c*¹. Elytra strongly nodose, the vestiture scattered and fasciculate; pro-, meso-, and metapleura very coarsely sculptured [*evulsa*, Kirsch.]
 - d*¹. Elytra feebly nodose, the vestiture condensed on the basal fourth; pro-, meso-, and metapleura more finely and densely sculptured * . . . [*liturata*, F.]
- d.* Prothorax with closely placed rounded punctures, separate one from another on the disc; elytra flattened, finely striate, the vestiture somewhat dense on the basal half *simplex*, sp. n.

* Characters taken from a specimen from Cayenne in British Museum.

1. *Glyptobaris rugata*. (Tab. XX. figg. 10, 10 a, ♂.)

Baridius rugatus, Boh. in Schönh. Gen. Curc. viii. 1, p. 170¹.

♂. Prosternum armed with two transversely placed tubercles in the middle near the base.

Hab. MEXICO (*coll. Solari*), Tultepec [Toulcpee¹], San Andres Tuxtla, Toxpam, Playa Vicente, Cosamaloapam (*Sallé*), San Rafael Jicaltepec (*Townsend*, in *U.S. Nat. Mus.*), Motzorongo (*Flohr*), Jalapa, Oaxaca (*Höge*), Teapa (*Höge*, *H. H. Smith*), Temax in N. Yucatan (*Gaumer*); BRITISH HONDURAS, Belize, Rio Hondo (*Blancaneaux*); GUATEMALA, La Tinta, Senahu, and San Juan in Vera Paz, Las Mercedes (*Champion*), Trece Aguas (*Barber & Schwarz*, in *U.S. Nat. Mus.*); NICARAGUA, Chontales (*Belt*); COSTA RICA, Puerto Limon (*Knab*, in *U.S. Nat. Mus.*); PANAMA, Tolé (*Champion*).

A widely-distributed and common insect in Central America, the series before me varying greatly in the sculpture of the upper surface, the single examples from Costa Rica and Panama having the elytra nodose, much as in *G. evulsa* (Kirsch).

2. *Glyptobaris spinigera*, sp. n. (Tab. XX. figg. 11, 11 a, ♂.)

Oblong, rhomboid-ovate, piceous, the tarsi ferruginous at the tip; the basal two-thirds of the elytra closely variegated with coarse, and the rest of the upper surface with scattered narrow, elongate, ochreous scales, the under surface and legs sparsely and finely setulose. Head very sparsely punctate, deeply transversely sulcate between the eyes, the latter rather small; rostrum strongly arcuate, a little longer than the head and prothorax, exceedingly stout, tapering towards the tip, somewhat abruptly bent inward at about the apical third in the ♂, coarsely, rugosely punctate, subcarinate at the base, becoming much smoother at the tip. Prothorax rounded at the sides anteriorly, very coarsely, confluent punctate, the smooth, narrow, raised interspaces forming sinuous longitudinal rugæ, the disc with a conspicuous median carina, which in the fully-developed ♂ is produced into a long, stout, smooth, spiniform process. Elytra rounded-triangular, flattened on the disc, narrowly punctate-striate, the interstices finely costate towards the sides and apex, seriate-punctate, the punctuation becoming closer and irregular towards the suture anteriorly. Beneath very coarsely, closely punctate. Basal process of the prosternum armed with two stout compressed tubercles in the ♂. Legs rugosely punctate.

Length $3\frac{1}{2}$ – $4\frac{1}{2}$, breadth $1\frac{3}{4}$ – $2\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Tapachula in Chiapas (*Höge*: ♂); GUATEMALA, Zapote and San Gerónimo (*Champion*).

Eight males and six females, one of the former with the prothoracic process small and just covering the scutellum. The females are separable from those of *G. rugata* by their more flattened and less uneven elytra. Perhaps an extreme form of *G. rugata*, localised in Guatemala and the adjacent portion of Mexico? *G. spinigera* is the only Barid known to me with a spiniform process to the base of the prothorax in the male.

3. *Glyptobaris solarii*, sp. n. (Tab. XX. fig. 12, ♀.)

Oblong-rhomboidal, shining, piceous, the base of the antennæ and the tarsi ferruginous; very sparsely clothed with long, pallid, setiform scales, the under surface and legs finely setulose. Head sparsely punctate, deeply transversely sulcate between the eyes; rostrum strongly arcuate, very stout, tapering, about as long as the head and prothorax, coarsely punctate, almost smooth at the tip. Prothorax obliquely and

rapidly narrowing from the base, strongly constricted in front; very coarsely, confluent punctate, the raised interspaces forming stout, sinuous, longitudinal rugæ, the median carina rather broad and sharply defined. Elytra oblong, rounded-triangular, transversely depressed on the disc before the middle, deeply striate, the inner interstices each with a row of coarse scattered punctures, the outer ones sharply raised and coarsely crenate-punctate.

Length $3\frac{1}{2}$, breadth $1\frac{1}{8}$ millim. (♀.)

Hab. NICARAGUA, Managua (*Solari*).

One specimen. Differs from all its allies in the subconical, extremely rugose prothorax, the coarse puncturing of the elytral interstices, and the very sparse vestiture, which is not condensed into patches on the elytra.

4. *Glyptobaris lecontei*, n. n. (Tab. XX. fig. 13, ♀, var.)

Onychobaris rugicollis, Lec. Proc. Am. Phil. Soc. xv. p. 297¹ (nec Kirsch).

Glyptobaris rugicollis, Casey, Ann. N. York Acad. Sci. vi. p. 520².

Hab. NORTH AMERICA, Middle, Eastern, and Southern Atlantic States^{1 2}.—MEXICO, Almolonga in Puebla and Jalapa in Vera Cruz (*Höge*).

Two females received from Mexico are a little larger than the specimens I have seen of Leconte's *O. rugicollis*, and have the prothorax more coarsely sculptured, and the elytral vestiture somewhat closer and coarser; but, to judge from the variation observed in *G. rugata*, they cannot be treated as a separate species.

5. *Glyptobaris simplex*, sp. n. (Tab. XX. figg. 14, 14 a, ♂.)

Oblong-ovate, moderately shining, nigro-piceous or black, the tarsi and antennæ ferruginous; the basal half of the elytra closely variegated with coarse, and the rest of the upper surface with scattered, oblong ochreous scales, the under surface and legs sparsely setulose. Head sparsely punctate, deeply transversely grooved between the eyes; rostrum strongly arcuate, a little longer than the head and prothorax, very stout, tapering towards the tip, coarsely, closely punctate, smooth at the apex, without basal carina. Prothorax strongly rounded at the sides anteriorly, constricted in front, the sides parallel at the base; closely impressed with coarse, rounded punctures, which on the disc are separate one from another. Elytra oblong-subtriangular, flattened, finely striate, the interstices confusedly punctate on the disc, uniseriate-punctate and obsolete costate at the sides. Beneath coarsely and closely, the median portion of the abdomen very sparsely and finely, punctate. Basal process of the prosternum armed with two compressed tubercles in the ♂.

Length 4–4½, breadth $1\frac{2}{10}$ – $2\frac{1}{8}$ millim. (♂ ♀.)

Hab. GUATEMALA, Coban (*Conradt*: ♂), Capetillo (*Champion*: ♀).

Two examples. Recognizable by the non-carinate and regularly punctured disc of the prothorax.

RHYTIDOBARIS, gen. nov.

Mandibles short, notched within, decussate; rostrum arcuate, moderately long, the antennæ inserted at or a little behind the middle, the antennal club ovate, small; prothorax bisinuate at the base; scutellum small, transverse, free, concave; elytra oblong-subcordate, slightly wider than the prothorax, the humeri obtuse, leaving the upper portion of the mesothoracic epimera exposed; pygidium vertical, exposed; prosternum flattened, with two parallel impressed lines anteriorly (*R. horrida*), or broadly and shallowly

sulcate (*R. granulosa*) from the apex to near the anterior coxæ, the latter separated by at least their own width; mesosternum depressed, exposed; legs short; femora abruptly excavate near the apex beneath, unarmed (*R. horrida*) or feebly serrate and sulcate (*R. granulosa*); tibiæ strongly unguiculate, sinuous and more or less dentate at their outer apical angle (*R. horrida*), or the intermediate and posterior pairs almost straight (*R. granulosa*), the anterior pair excavate at the apex beneath for the reception of the base of the tarsus; tarsal claws short, free or narrowly separated; body oblong-ovate, rugose, setose or squamose.

Type, *R. horrida*.

The two species placed under *Rhytidobaris* agree sufficiently well *inter se* to be included in the same genus: the difference in the form of the prosternal sulcus is one of degree, and that of the armature of the legs and of the vestiture of the upper surface is perhaps unimportant. The present genus is allied to *Methyorrhina*, Pascoe, which has a peculiarly formed rostrum, a large, squamose scutellum, an unimpressed prosternum, more approximate anterior coxæ, &c. From *Glyptobaris* it may be known by the decussate mandibles, parallel prosternal lines, &c.

1. *Rhytidobaris horrida*, sp. n. (Tab. XX. figg. 15, 15 a.)

Subopaque above, shining beneath, nigro-piceous; sparsely clothed with rather long, erect, intermixed ochreous and blackish setæ, the punctures on the under surface each bearing a very minute ochreous scale, the legs setulose. Head globose, small, bare, closely punctate, transversely grooved between the eyes; rostrum moderately stout, about as long as the head and prothorax, shining, closely, the apical half more sparsely, punctate, the antennæ inserted near the middle, the funiculus stout, the club small and densely pubescent. Prothorax transverse, broad, narrow and feebly constricted in front, the sides strongly rounded anteriorly and slightly converging towards the base; very densely, finely, confluent punctate, the extremely narrow interspaces sinuous or oblique. Elytra comparatively short, punctate-sulcate, the interstices very little wider than the sulci, narrowly raised on either side and each with a row of shallow oblong impressions. Pygidium short, small, densely punctate. Beneath coarsely, closely punctate. Prosternal lines not reaching the anterior coxæ, the intercoxal space flat and as wide as the coxa. Femora unarmed. Tibiæ short, sinuous, acute at their outer apical angle. Tarsal claws free.

Length $3\frac{1}{2}$, breadth $1\frac{2}{3}$ millim. (♀?)

Hab. PANAMA, Caldera in Chiriqui 2100 feet (*Champion*).

One specimen. Smaller, narrower, and less rugose than the Brazilian *Methyorrhina hispida*, Pasc., the rostrum arcuate and much more slender, the setæ less numerous, the scutellum small and almost bare, &c.

2. *Rhytidobaris granulosa*, sp. n. (Tab. XX. figg. 16 *, 16 a.)

Opaque above, shining beneath, nigro-piceous; somewhat sparsely clothed with small, narrow, adpressed ochreous scales, those on the prothorax long and hair-like, and those on the elytra oblong-oval and clustered into scattered fascicles on the alternate interstices, the third with an oblong patch at the base. Head comparatively large, squamose, unimpressed between the eyes, densely punctate; rostrum moderately stout, scarcely so long as the head and prothorax, rather sparsely, the basal portion closely, punctate, the antennæ inserted at a little behind the middle. Prothorax transverse, broad, narrow and feebly constricted in front, the sides rounded anteriorly and subparallel at the base; densely, finely,

* Foreshortened in our figure.

confluently punctate, and with indications of a raised median line, the extremely narrow interspaces oblique or sinuous. Elytra finely punctate-striate, the dorsal striæ slightly sinuate, the interstices flat, rugulose and finely granulate, 3, 5, 7, and 9 wider than the rest. Pygidium rather large, densely punctate. Beneath coarsely, closely punctate. Prosternum with a broad, parallel-sided, shallow, bare sulcus. Anterior coxæ separated by a little more than their own width, the intervening space flat and very coarsely punctured. Femora feebly serrate along the edges of the shallow sulcus beneath. Anterior tibiæ sinuate, the others almost straight. Tarsal claws small, narrowly separated.

Length 4, breadth $1\frac{9}{10}$ millim. (♀?)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen. Larger and more robust than *R. horrida*, the head larger, squamose, and without transverse groove between the eyes, the vestiture entirely decumbent, the elytral sculpture very different, the pygidium larger, the tarsal claws more approximate, the prosternal excavation and tibiæ dissimilarly formed, the femora feebly serrate and shallowly sulcate beneath.

LEPIDOBARIS, gen. nov.

Mandibles strongly decussate; rostrum abruptly separated from the head, arcuate, moderately long, stout, the apical portion parallel-sided and slightly wider than the basal portion, the scrobes rapidly descending, the antennæ inserted at about the middle, the antennal club stout and ovate; prothorax narrow, often gibbous as seen in profile, transverse, deeply bisinuate at the base, constricted in front, the anterior margin sinuate laterally; scutellum free, transverse, concave, small; elytra much wider than the prothorax, long, parallel-sided, separately rounded at the base and apex, often uneven or with prominent subapical callosities; pygidium exposed, vertical, large, transverse; prosternum more or less sulcate from the apex to as far as the middle of the coxæ (indistinctly so in *L. bifasciculata* and *L. nitidipennis*), the basal process narrowing forwards, short, and not prominent; anterior coxæ exerted, narrowly separated; mesosternum depressed, the upper portion of the epimera visible from above; ventral segments 1 and 2 connate at the middle, 5 with a small truncate prominence at the apex in the ♂; femora unarmed, sublinear; tarsal claws long, narrowly separated; body elongate or oblong, more or less squamose, the scales often clustered into crests or fascicles on the prothorax or elytra.

Type, *L. acnisti*.

Five species are referred to this genus, the type being a common insect in Costa Rica, *L. bifasciculata* and *L. nitidipennis* differing from the rest in having a very shallow prosternal sulcus. *Lepidobaris* is perhaps nearest related to *Trichobaris* and *Stictobaris*, though their respective representatives are very different in appearance. *L. acnisti* and *L. opacipennis* have prominent, tuberculiform, subapical callosities, and the black vestiture of the prothorax and elytra clustered into patches or fascicles, much as in *Ambates solani* and its allies. *Methyorrhina*, Pasc., from Brazil, is also an allied genus.

a. Elytra partly or entirely opaque, with prominent, tuberculiform, subapical callosities.

a'. Prothorax and elytra with velvety-black patches on the disc, in addition to the other vestiture.

*a*². The black scales on the prothorax condensed into two sinuous lines . . . *acnisti*.

*b*². The black scales on the prothorax condensed into two triangular patches. *opacipennis*.

- b'*. Prothorax and elytra with scattered ochreous scales only, these latter condensed into two prominent fascicles near the apex *bifasciculata*.
b. Elytra shining, the subapical callosities inconspicuous.
c'. Elytra with very large, scattered, subtriangular, white scales intermixed with small darker scales *latisquamis*.
d'. Elytra with moderately large, scattered, subtriangular scales intermixed with small darker scales *nitidipennis*.

1. *Lepidobaris acnisti*, sp. n. (Tab. XX. figg. 17, 17 *a*, *b*, ♂.)

Elongate, opaque, the inner half of the elytra, the median line of the prothorax, the abdomen, and metasternum shining, black, the antennæ and tarsi in part or entirely ferruginous; the rostrum with the basal half (♂) or base (♀) fulvo-squamose; the prothorax variegated with stout, erect, intermixed velvety-black and fulvous scales, the black ones clustered into two sinuous lines along the middle of the disc; the elytra with irregular, coalescent, oblong patches of broad, imbricate, intermixed velvety-black, fulvous, and whitish scales extending down the disc from a little below the base to the apex; the legs and the under surface of the prothorax fulvo-squamose, the rest of the ventral surface (except in the ♂) almost bare. Head closely punctate; rostrum (♂) stout, about as long as the head and prothorax, densely punctate, and opaque, (♀) a little longer and more slender, flatter, very sparsely punctate, and bare from near the base. Prothorax strongly transverse, gradually narrowing from the base, constricted in front; densely, finely punctate, except along the smooth central line. Elytra long, transversely depressed on the disc before and beyond the middle, the humeri rounded and slightly tumid; finely punctate-striate, the interstices broad, finely, confusedly punctate, flat, the fifth swollen into an oblong hump at its point of termination. Pygidium densely punctate. Beneath coarsely and closely, the ventral segments very sparsely and finely, punctate, 1 and 2 with a hollowed, closely punctate, densely fulvo-pilose space down the middle in the ♂, and 5 with a truncated prominence at the centre of the apical margin, on either side of which is a semicircular emargination, in this sex. Prosternum sulcate, the sulcus deep and limited by a sharp ridge on each side anteriorly, shallow and V-shaped between the coxæ, the latter hollowed within and separated by less than half their own width. Legs rugosely punctate.

Length 4-5½, breadth 1½-2½ millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas (*Champion*); COSTA RICA, Irazu (*Rogers*), San José (*Biolley*).

Sent in abundance by the late P. Biolley, who found it on the leaves of the "guitite" (*Acnistus arborescens*, Schlecht.), a shrub of the order Solanaceæ. A remarkable form, with the general facies of an *Ambates*.

2. *Lepidobaris opacipennis*, sp. n. (Tab. XX. figg. 18, 18 *a*, ♀.)

Oblong, opaque, the prothorax, metasternum, and abdomen, and sometimes the sutural region of the elytra also, shining, black, the antennæ and tarsi ferruginous; the rostrum fulvo-squamose at the base; the prothorax thickly clothed with coarse, semierect, intermixed velvety-black, fulvous, and whitish scales, the black scales almost entirely condensed into two large triangular patches on the basal half; the elytra with a dense elongate patch of coarse velvety-black scales at about the middle of the second and third interstices and an oblong black spot at the apex of the fifth, the space between the median patch and the suture set with a few broad, triangular, fulvous or whitish scales, the vestiture of the rest of their surface in great part blackish and inconspicuous; the under surface almost bare. Head finely punctate; rostrum (♂) stout, a little longer than the head and prothorax, gibbous at the base, opaque, and densely punctate, (♀) strongly arcuate, longer, and smoother. Prothorax short, abruptly constricted in front, appearing angulate at the sides anteriorly; densely, finely punctate. Elytra moderately long, flattened, transversely depressed on the disc before and beyond the middle, and compressed at the sides below the

humeri; finely punctate-striate, the second and third striae sinuous, the interstices alutaceous, closely punctate, flat, 5 raised into an oblong hump at its point of termination. Pygidium densely punctate. Beneath closely and coarsely, the ventral segments very sparsely and finely, punctate, 1 and 2 with a depressed fulvo-pilose space down the middle, and 5 with a truncated prominence in the centre at the apex, in the ♂. Prosternum as in *L. acnisti*. Anterior coxae narrowly separated.

Var. The velvety-black patch on the middle of each elytron reduced to a streak on the third interstice, the larger pallid scales wanting.

Length $2\frac{5}{8}$ – $3\frac{1}{2}$, breadth $1\frac{1}{3}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, El Tumbador, Zapote, Capetillo, Dueñas (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Numerous examples. The form selected as typical (fig. 18) is from the Pacific slope of Guatemala, the other from Chiriqui. Smaller and less elongate than *L. acnisti*; the prothorax abruptly constricted in front, and with two large triangular patches of black scales on the basal half of the disc; the elytra much shorter, with the dorsal striae sinuous and the black patches reduced in size. The male-characters are similar in the two species.

3. *Lepidobaris bifasciculata*, sp. n. (Tab. XX. figg. 19, 19 a, ♂.)

♂. Elongate, rather narrow, depressed, opaque, the abdomen shining, black, the antennae, tip of the rostrum, and tarsi ferruginous; the head and rostrum, the prothorax above (especially along the median line) and beneath, the scutellum, the apex of the elytra, pygidium, the third and fourth ventral segments at the sides and the fifth at the apex, and the legs, sparsely clothed with long, coarse, narrow, ochreous scales, some of those near the apex of each elytron erect and clustered into a dense prominent fascicle, the rest of the surface almost bare. Head closely punctate, squamose above; rostrum not longer than the head and prothorax, moderately stout, gibbous at the base, rugulosely punctate and squamose to the tip. Prothorax narrow, transverse, subcylindrical, constricted in front; closely punctate, except along an oblong space near the margin. Elytra long, somewhat widened posteriorly, flattened, transversely depressed on the disc below the base and near the middle, the humeri not prominent; very finely and shallowly punctate-striate, the interstices densely alutaceous, faintly uniseriate-punctate, flat, the fifth swollen into an oblong hump at its point of termination, the third with a compressed tuberculiform prominence near the apex. Pygidium densely punctate. Beneath closely and coarsely, the ventral segments very sparsely and finely, punctate, 1 and 2 with a densely punctate, ochreo-pilose excavation extending down the middle, 5 truncate in the centre at the apex. Prosternum slightly hollowed behind the transverse subapical groove. Anterior coxae narrowly separated.

Length $4\frac{1}{2}$, breadth $1\frac{5}{8}$ millim.

Hab. PANAMA, Volcan de Chiriqui (*Champion*).

One male. In this insect the long, narrow ochreous scales on the elytra are almost entirely placed on the apical fourth, and there mainly clustered into a prominent, spiniform fascicle, while those on the prothorax are condensed into a median line.

4. *Lepidobaris latisquamis*, sp. n. (Tab. XX. figg. 20, 20 a, b, ♀.)

Oblong, shining, the prothorax beneath and the sternal side-pieces opaque, black, the antennae and tarsi more or less ferruginous; the rostrum albo-squamose at the base; the prothorax clothed with coarse, intermixed, adpressed ochreous or whitish and semierect black scales, the pallid scales mainly condensed into a dense, sharply-defined, sinuous vitta on each side and an interrupted median line; the elytra with intermixed subseriately arranged, oblong blackish (or brown) and irregularly distributed, very large, fan-

shaped white scales; the under surface and legs also with intermixed minute and larger white scales, the latter condensed into spots on the sides of the third and fourth ventral segments and an annulus near the apex of one or more of the femora. Head finely punctate; rostrum (♂) stout, gibbous at the base, curved, about as long as the head and prothorax, rugosely punctate, (♀) more elongate and with the bare apical portion longer and much smoother. Prothorax transverse, abruptly constricted in front, coarsely, closely punctate, and with indications of a smooth median line. Elytra moderately long, flattened on the disc, transversely depressed below the base, the subapical callosities not prominent; sharply, narrowly striate, the striae feebly punctate, the interstices flat, irregularly seriate-punctate, becoming rougher towards the sides. Pygidium densely punctate. Beneath coarsely and closely, the ventral segments more finely and sparsely, punctate, 1 and 2 with a depressed, ochreo-pilose space down the middle, and 5 with a truncated prominence in the centre at the apex, in the ♂. Prosternum as in *L. acnisti*.

Length $3\frac{2}{3}$ – $4\frac{1}{10}$, breadth $1\frac{3}{8}$ –2 millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*), Yolos and Juquila in Oaxaca (*Sallé*).

Six specimens. Nearly related to *L. opacipennis*: the elytra shining, and clothed with intermixed very large scattered white and small blackish scales, the subapical callosities not prominent; the prothorax abruptly constricted in front, and with a densely squamose sinuous, marginal, whitish or ochreous stripe; the femora more or less annulate with white near the tip. The large fan-shaped scales on the elytra (fig. 20 b) are as broad as the interstices.

5. *Lepidobaris nitidipennis*, sp. n. (Tab. XX. figg. 21, 21 a, ♂.)

Very like *L. latisquamis*, but with the scattered subtriangular whitish scales on the elytra (fig. 21 a) much smaller (those on the disc not half the width of the interstices 2–9), the sinuous marginal stripe on the prothorax reduced to a narrow, oblique, interrupted streak, the median line represented by a short streak at the base, the rostrum and femora without dense patches of white scales; the rostrum less gibbous at the base, in the ♀ more slender, much longer, and with the apical half smooth; the elytra transversely depressed on the disc before and beyond the middle, finely striate, the interstices (the first excepted) confusedly punctate, the subapical callosities more prominent; the prosternal sulcus shallow or wanting; the ventral segments 1 and 2 with a depressed, densely fulvo-pilose space down the middle, and 5 with a truncated prominence in the centre at the apex, in the ♂.

Length $3\frac{1}{2}$ –4, breadth $1\frac{3}{4}$ –2 millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*), Cordova, Toxpan (*Sallé*).

Two males and one female. This appears to be the Vera Cruz (or Atlantic slope) form of *L. latisquamis*, and one that requires a distinctive name.

TRICHOBARIS.

Trichobaris, Leconte, Proc. Am. Phil. Soc. xv. p. 287 (1876); Casey, Ann. N. York Acad. Sci. vi. pp. 467, 561.

The species of this genus inhabit the Southern United States and Mexico, some of them being very destructive to potato and tobacco crops, as well as to various wild and cultivated Solanaceous plants. The true *T. trinotata* (Say), the "potato-stalk weevil" *, has recently reached as far north as Canada, but it has not yet been

* For an account of the habits and distribution of this species, see Chittenden, U.S. Dep. Agric., Div. Ent., Bull. no. 33, n. ser. pp. 9, 10 (1902).

seen south of Texas, and the Mexican insects standing under that name in collections are referable to *T. vestita* or *T. soror*. The described forms are difficult to distinguish; those inhabiting Mexico may be separated thus:—

- a.* Prothorax with a small denuded spot on each side at the base, rarely obsolete.
 - a*¹. Prothorax usually with a large partially denuded space on the flanks; rostrum short and more or less curved in both sexes; body flattened above.
 - a*². Ventral segments 3 and 4 bare at the base, the vestiture of the basal depression of ♂ different from that of the rest of the surface *vestita*, Boh.
 - b*². Ventral segments 3 and 4 with their median third bare, the vestiture of the basal depression of ♂ similar to that of the rest of the surface *mucorea*, Lec.
- b*¹. Prothorax with at most one or two small bare spots on the flanks, usually entirely albo-squamose.
 - c*². Rostrum short and curved in both sexes; body somewhat convex above, with the vestiture denser and rather coarse. *compacta*, Casey.
 - d*². Rostrum short and feebly curved in ♂, much longer and almost straight in ♀; body flattened above, with the vestiture finer *soror*, sp. n.
- b.* Prothorax without denuded spots at the base; body narrow.
 - c*¹. Vestiture moderately coarse, above and beneath *pellicca*, Boh. (*texana*, Lec.).
 - d*¹. Vestiture coarser, the scales on the under surface broader . . . *cylindrica*, Casey.

1. *Trichobaris vestita*. (Tab. XX. fig. 22, ♂.)

Baridius vestitus, Boh. in Schönh. Gen. Curc. iii. p. 718¹ (part.) (nec op. cit. viii. p. 171, ♀²).

Hab. MEXICO¹ (*Truqui*, in *Mus. Brit.*), Guanajuato, Toxpan, Etla (*Sallé*), Orizaba (*H. H. Smith*), Jalapa (*M. Trujillo*), Mexico city, Cerro de Plumas, Oaxaca (*Höge*), Cuernavaca, Cordova (*U.S. Nat. Mus.*), Puente de Ixtla (*Wickham*), Tehuantepec (*Mus. Brit.*).

The name *vestita* is here applied to the form common in Vera Cruz and Oaxaca; the female subsequently described in Schönherr's work² is no doubt referable to *T. soror*. The present species (sunk as synonymous with *T. trinotata*, Say, by Leconte, and queried as possibly identical with *T. mucorea*, Lec., by Casey) has the rostrum short and abruptly bent downward from the base in both sexes (fig. 22), the prothorax usually with a large space on the flanks almost bare, and the depressed space on the basal half of the abdomen of the male thickly clothed with coarse, long, radiating scales. *T. vestita* is a little less elongate than *T. mucorea*, the rostrum is less curved (appearing more abruptly gibbous at the base), the median space on the ventral segments 3 and 4 is denuded at the base only, and the depression of the male is clothed

with modified scales. In the single specimen from Cuernavaca the vestiture of the upper surface is dark brown, except at the sides of the prothorax, where it is white, and one (♀) from Guanajuato wants the bare space on the propleura.

2. *Trichobaris mucorea*.

Baridius mucoreus, Lec. Proc. Acad. Phil. 1858, p. 79¹; 1868, p. 364².

Trichobaris trinotata, var. *mucorea*, Lec. Proc. Am. Phil. Soc. xv. p. 288³.

Trichobaris mucorea, Casey, Ann. N. York Acad. Sci. xv. pp. 562, 564⁴.

Hab. NORTH AMERICA, Southern California and Arizona⁴, Texas; LOWER CALIFORNIA⁴.—MEXICO, Mexican boundary (*Morrison*), Ventanas (*Forrer*), San Blas (*U.S. Nat. Mus.*), Durango city (*Höge*).

Specimens of this species (♂ ♀) from San Blas and other localities in N.W. Mexico agree perfectly with those before me from California and Texas. The vestiture of the ventral depression of the male, as stated by Casey, is uniform with that of the rest of the under surface, and the median space on the segments 3 and 4 is almost entirely bare. The San Blas examples are labelled as having been found on tobacco. *T. mucorea* is known in the United States under the name of the "Tobacco-stalk weevil," and it is also said to attack *Solanum carolinense* and *Datura stramonium* and *D. tatula* [*cf.* Bridwell, U.S. Dep. Agric., Div. Ent., Bull. no. 44, pp. 44–46 (1904)].

3. *Trichobaris compacta*.

Trichobaris compacta, Casey, Ann. N. York Acad. Sci. vi. pp. 563, 566¹.

Hab. NORTH AMERICA, Southern California and Arizona¹, New Mexico.—MEXICO, Mexican boundary (*Morrison*), Pinos Altos in Chihuahua (*Buchan-Heepburn*), Tres Marias Is., Presidio, Ventanas (*Forrer*), Durango city (*Höge*).

Specimens from Durango differ from those from the other Mexican localities, as well as from the examples before me from California and Arizona, in having small partly denuded spots on the flanks of the prothorax and the vestiture of the upper surface brownish-ochreous or brownish-cinereous. *T. compacta* is less elongate and more convex than *T. mucorea*, the vestiture is a little coarser, and the ventral depression of the male is deeper, and more sparsely and not so coarsely squamose. Cockerell has found it upon *Datura meteloides* in New Mexico and Bridwell records it as breeding in the seed-pods of the jimson (*Datura*).

4. *Trichobaris soror*, sp. n. (Tab. XX. figg. 23, 23 a, ♀.)

Baridius vestitus, Boh. in Schönh. Gen. Curc. viii. 1, p. 171 (♀, nec ♂)¹.

Oblong, flattened above, black, rather dull; thickly clothed with narrow cinereous or pale brown scales, which are transversely arranged on the prothorax and obliquely so on the elytral interstices, the vestiture of the under surface and legs coarser, denser, and wholly white, that of the antennal club in great part brown, the prothorax with a small spot on each side at the base, the scutellum, and sometimes a spot on each shoulder, almost bare, the ventral segments 3 and 4 with a narrow bare transverse space

in the middle at the base. Head glabrous, finely punctate, transversely grooved between the eyes; rostrum gibbous at the base, (σ) short, stout, and feebly curved, (φ) longer than the head and prothorax, more slender, and almost straight, in both sexes closely punctate and squamose, the antennæ inserted at (φ) or beyond (σ) the middle, the antennal club acuminate-ovate and moderately large. Prothorax transverse, constricted in front and slightly sinuate at the sides at about the middle; densely confluent punctate, and sometimes with indications of a faint median carina. Elytra flattened on the disc, rather broad, parallel-sided, separately rounded at the apex, and with rather prominent subapical callosities; finely punctate-striate, the interstices densely punctate. Beneath densely punctate. Prosternum slightly depressed along the middle. Ventral segments 1 and 2 broadly and shallowly excavate, and clothed with rather narrow scales, in the σ , the vestiture of the corresponding space in the φ similar to that of the rest of the surface.

Length $4\frac{4}{5}$ – $6\frac{1}{2}$, breadth 2 – $2\frac{7}{8}$ millim. (σ φ .)

Hab. MEXICO¹ (*Truqui*, in *Mus. Brit.*; *Herrera*, in *U.S. Nat. Mus.*), Durango (*Dr. Palmer*, in *U.S. Nat. Mus.*), Guanajuato, Parada (*Sallé*), Matamoros Izucar (*Höge*), Tehuantepec (*Mus. Brit.*).

Numerous examples, the selected types (σ φ) being from Guanajuato. Very like *T. mucorea*, Lec., but with the rostrum less curved in the male, and elongated and almost straight in the female, the propleura with, at most, one or two small partially denuded spots on the flanks, the ventral segments 3 and 4 with a narrower bare space at the base. The long and almost straight rostrum of the female separates *T. soror* from all the other species described by Casey.

5. *Trichobaris pellicea*. (Tab. XX. figg. 24*, 24a, σ .)

Baridius pelliceus, Boh. in Schönh. Gen. Curc. viii. 1, p. 160¹.

Trichobaris texana, Lec. Proc. Am. Phil. Soc. xv. p. 288²; Casey, Ann. N. York Acad. Sci. vi. pp. 563, 566³.

Hab. NORTH AMERICA, New Mexico, Colorado³, Texas^{2 3}.—MEXICO¹ (*Truqui*, in *Mus. Brit.*), Durango city (*Höge*), Matamoros Izucar (*Sallé*), Mexico city (*U.S. Nat. Mus.*), Puente de Ixtla (*Wickham*).

The "type" of this species, communicated by Dr. Sjöstedt, is labelled "Calif.," and it does not differ from the N.-American *T. texana*, Lec. This insect may be known by the dense uniform vestiture of the upper and under surfaces, the scutellum only being partially denuded, and its narrow, rather convex shape. The ventral depression of the male is clothed with narrower setiform scales. In some of the Mexican specimens the vestiture of the upper surface is brown with a few white scales intermixed, the sides of the prothorax being also white. *T. texana*, according to Bridwell, attacks the bull nettle (*Solanum rostratum*). The length varies from $3\frac{1}{5}$ –6, and the breadth from $1\frac{1}{3}$ – $2\frac{1}{3}$ mm.

6. *Trichobaris cylindrica*.

Trichobaris cylindrica, Casey, Ann. N. York Acad. Sci. vi. pp. 563, 567¹.

Hab. NORTH AMERICA, Arizona¹.—MEXICO, Monclova in Coahuila (*Dr. Palmer*).

* Foreshortened in our figure.

A single specimen (σ) from Coahuila seems to belong to this species. It differs from *T. pellicea (texana)* in having larger scales, on both the upper and under surfaces.

CYANOBARIS, gen. nov.

Mandibles short, decussate; rostrum (fig. 25 *a*) very short and stout, almost straight, abruptly, transversely gibbous at the base, widening outwards, the scrobes rapidly descending, the antennæ inserted towards the apex, the antennal club ovate; prothorax shortly tubulate at the apex and broadly subtruncate at the base; scutellum transverse, free, prominent; elytra a little wider than the prothorax, very elongate; pygidium very large, exposed, declivous; prosternum unimpressed behind the transverse subapical groove, the basal portion short; mesosternum long and depressed, the meso-metasternal suture in a line with the posterior margin of the middle coxæ; anterior coxæ exerted, narrowly separated; femora linear, sharply dentate, the posterior pair nearly reaching the third ventral suture; tibiæ unguiculate; tarsal claws subconnate at the base; body very elongate, narrow, depressed, linear, metallic.

Type, *C. rufiventris*.

This genus seems to be related to *Lichnus*, Lacordaire, but it is best placed in the section "Baridiides vrais" of that author. The general shape is that of a Cossonid.

1. *Cyanobaris rufiventris*, sp. n. (Tab. XX. figg. 25, 25 *a*.)

Opaque, alutaceous, cyaneous, the abdomen rufous and moderately shining; almost glabrous above, the punctures on the under surface and legs each bearing a small, hair-like scale. Head densely punctate; rostrum scarcely longer than the head as seen in profile, rugosely punctate. Prothorax very little broader than long, gradually narrowing from the base to the tubulate apical portion, the base feebly sinuate on each side; closely impressed with coarse rounded punctures, except along the median line. Elytra parallel for about three-fourths of their length, flattened down their inner half, the humeri rounded; shallowly punctate-striate, the interstices flat, rather coarsely and closely uniseriate-punctate, the puncturing becoming coarser and denser towards the base. Pygidium densely, rugulosely punctate. Beneath very coarsely and closely, the ventral segments 2-5 more sparsely and finely, punctate. Legs rugosely punctate, rather slender.

Length $6\frac{1}{2}$, breadth 2 millim. (φ ?)

Hab. MEXICO, Santecomapan * in Vera Cruz (*Sallé*).

One specimen.

ANOPSILUS.

Anopsilus, Kirsch, Berl. ent. Zeitschr. 1869, p. 218.

Balbus, Pascoe, Ann. & Mag. Nat. Hist. (6) iv. pp. 322, 323 (1889).

The type of *Anopsilus* is *A. bonvouloiri*, Kirsch, and that of *Balbus*, *Centrinus conicollis*, Boh. The species of this genus have large, prominent, subcontiguous anterior coxæ, and the male of *A. conicollis*, like that of various other S.-American forms, has two short prosternal spines. *Centrinus superbificus*, *suspensus*, *obniger*, *asphaltinus*, *capreolus*, and *oblongus*, Boh., probably belong here. They are all oblong, polished, black, almost glabrous insects, with a more or less conical prothorax, &c.

* Sometimes written "Santa Maria Comapa" or "Santa Maria Acomapan."

1. **Anopsilus bonvouloiri.** (Tab. XX. figg. 26, 26 a, ♂.)

Anopsilus bonvouloiri, Kirsch, Berl. ent. Zeitschr. 1869, p. 219¹.

Anopsilus mexicanus, Solari, Ann. Mus. Genova, xlii. p. 440 (1906)².

Centrinus levistriatus, Chev. in litt.³

Hab. MEXICO (*Mus. Brit.*; *Höge*²; *Flohr*), Playa Vicente, Toxpam (*Sallé*), Jalapa, Cordova (*Höge*); GUATEMALA, San Gerónimo and Sinanja in Vera Paz (*Champion*).—COLOMBIA, Bogota¹.

Not uncommon in the Mexican State of Vera Cruz, some specimens having the elytra obsolete striato-punctate (*A. bonvouloiri*) and others the elytra finely but distinctly punctate-striate (*A. mexicanus*). The prosternum in both sexes is more or less fulvo-pilose along the middle (the sulcus included) from the apex to the base, the vestiture being abundant behind the anterior coxæ. The male has a very large oval depression on the first ventral segment. The antennæ are inserted towards the apex in both sexes. I have seen the types (♂ ♂) of Kirsch and Solari; the locality "Sierra Durango," quoted by the last-mentioned author², requires confirmation.

LEPTINOBARIS, gen. nov.

Mandibles short, decussate; rostrum moderately long, arcuate, cylindrical, the antennæ inserted beyond the middle, with joints 2-7 of the funiculus short and closely articulated, and the club ovate; prothorax feebly sinuate at the base; scutellum oblong, subquadrate, flat; elytra elongate, conjointly rounded at the apex; pygidium short, exposed, vertical; prosternum with a shallow, parallel-sided sulcus, which extends forwards to the apex and terminates in the v-shaped space between the narrowly-separated, rather small anterior coxæ, the basal portion very short and depressed; mesosternum depressed, exposed; metathoracic episterna narrow; ventral segment 5 very little longer than 3 or 4, 1 and 2 connate; legs short; femora unarmed, the anterior pair feebly clavate; anterior tibiæ (♂) strongly bi- (fig. 27 b), and the others feebly uni-, unguiculate; tarsal claws minute, connate at the base; body narrow, subcylindrical, polished.

Type, *L. bidens*.

The type of *Leptinobaris* is of the same general shape as *Stenobaris avicenniæ*, Linell, which also has narrowly separated anterior coxæ; but the two genera are not otherwise very closely related. The strongly biunguiculate anterior tibiæ is a striking character, and one that is also to be found in the male of "*Centrinus*" *suspensus*, Boh., an insect probably belonging to the genus *Anopsilus*. *Microbaris*, Casey, based upon a minute Texan insect, seems to be nearly related to *Leptinobaris*.

1. **Leptinobaris bidens**, sp. n. (*Leptobaris bidens*, Tab. XX. figg. 27*, 27 a, b, ♂).

Very shining, black, the antennæ and tarsi ferruginous; almost glabrous above, the prosternum (including the sulcus) and metathoracic episterna somewhat thickly, and the rest of the under surface very sparsely, clothed with narrow hair-like whitish scales. Head very sparsely, minutely punctate, faintly foveate between the eyes; rostrum nearly as long as the head and prothorax, rather slender, very sparsely,

* The insect is narrower and more cylindrical than represented on the Plate. The generic name *Leptobaris* proves to be preoccupied.

finely punctate, smooth at the tip. Prothorax convex, nearly as long as broad, narrowed in front, the sides rounded anteriorly and parallel behind; very sparsely, minutely punctate and with a row of coarser squamigerous punctures along the basal margin. Scutellum smooth. Elytra long, very gradually narrowing from about the basal third; finely punctate-striate, the interstices broad, flat, and almost smooth. Pygidium rugulosely punctate. Beneath closely and coarsely, the abdomen very sparsely and finely, punctate; first ventral segment shallowly sulcate down the middle.

Length $2\frac{1}{2}$, breadth 1 millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One specimen.

MACROBARIS, gen. nov.

Mandibles short, decussate; rostrum (fig. 28 *a*) very short, stout, abruptly bowed from the base, flattened and thinner at the tip, the antennæ inserted at the middle, joints 2-7 of the funiculus short and closely articulated, the club small, ovate, the scrobes deep and oblique; eyes large, transverse; prothorax feebly sinuate at the base; scutellum small, oblong, subquadrate, flat; elytra very elongate; pygidium exposed, strongly transverse, subvertical; prosternum with a deep, sharply-defined sulcus, which is obliquely narrowed from the apex to the subcontiguous, large, exerted anterior coxæ, the very narrow space between the latter not raised and on a level with the short basal portion; mesosternum short, depressed; metathoracic episterna narrow; ventral segments 2 and 5 equal in length, 3 and 4 each about half as long as 2; legs moderately long; femora unarmed, sublinear; tibiæ slender, strongly unguiculate, the claw on the anterior pair (♂) very long; tarsal claws minute, connate at the base; body very elongate, narrow, cylindrical, polished, almost glabrous.

Type, *M. producta*.

This genus, based on a single species, from Guatemala, is nearly allied to *Leptinobaris*, from which it may be distinguished by the large, prominent, subcontiguous anterior coxæ (the space between them not in the least raised), the deep anteriorly-widened prosternal sulcus, the differently formed rostrum, the uni-unguiculate anterior tibiæ (in the male), the very elongate elytra, &c. The only described S.-American genus approaching *Macrobaris* is *Parallelosomus*, Schönh.

1. *Macrobaris producta*, sp. n. (Tab. XX. figg. 28, 28 *a*, *b*, ♂.)

Shining, black, the antennæ and tips of the tarsi obscure ferruginous; almost glabrous above, the pygidium and under surface with a few fine hair-like whitish scales. Head sparsely, finely punctate, deeply foveate between the eyes; rostrum a little longer than the head as seen in profile, sparsely punctate, smooth at the tip. Prothorax slightly longer than broad, rather convex, narrowing from about the middle, feebly constricted in front; very sparsely, finely punctate. Scutellum smooth. Elytra a little wider than, and about two and one-half times the length of, the prothorax, subparallel, somewhat produced at the apex, the apices each with a small angular prominence, the humeri rounded; finely, but sharply punctate-striate, the interstices flat and almost smooth. Pygidium rugulosely punctate. Beneath very sparsely punctate; ventral segment 1 deeply, and 5 shallowly, excavate down the middle.

Length $3\frac{5}{8}$ -4, breadth 1 millim. (♂.)

Hab. GUATEMALA, Ducñas (*Champion*).

One specimen.

DOLICHOBARIS, gen. nov.

Mandibles short, decussate; rostrum arcuate, cylindrical, moderately long, sometimes very elongate in the ♀ (*D. opaciceps*), the antennæ inserted near (♂) or behind (♀) the middle, the joints 2-7 of the funiculus

short, narrow, the club pubescent, ovate, and rather stout; eyes rather large; prothorax short, very feebly sinuate at the base; scutellum free, subquadrate; elytra cblong or elongate, much wider than the prothorax, subparallel in their basal half; pygidium exposed; prosternum not or feebly impressed down the middle, the basal portion short and depressed; anterior coxæ subcontiguous or narrowly separated; mesosternum exposed, depressed; ventral segments 2 and 5 subequal in length, 1 and 2 connate; femora feebly clavate, unarmed; tibiæ narrow, almost straight, strongly unguiculate; tarsi slender, the lobes of the third joint narrow, the claws free; body elongate or oblong, narrow, almost glabrous.

Type, *D. opaciceps*.

A genus including three small, closely allied forms—two from Central America and *Baridius longirostris*, Kirsch, from Peru. They bear a certain resemblance to various members of the genera *Limnobaris* (*L. æneola*, *L. pygmæa*, &c.) and *Pseudobaris* (*P. angustula*, Lec., &c.), as well as to *Desmoglyptus crenatus* (Lec.), but are readily separated therefrom by the comparatively narrow prothorax, which is feebly sinuate at the base, the parallel-sided elytra, &c. The abrupt antennal club, the non-sulcate prosternum, the subcontiguous or narrowly separated anterior coxæ, and the exposed pygidium are also characteristic of *Dolichobaris*.

1. *Dolichobaris opaciceps*, sp. n. (Tab. XX. figg. 29, 29 *a*, ♂; 30, ♀.)

Elongate, finely alutaceous, moderately shining or subopaque, varying in colour from testaceous to piceous. Head densely alutaceous, opaque, obsoletely punctate; rostrum (♂) about as long as the head and prothorax, shining, moderately stout, and somewhat closely punctate, (♀) much more elongate, slender, and almost smooth in its outer half, the antennæ in the ♂ inserted slightly beyond, and in the ♀ at a little behind, the middle. Prothorax transverse, rather convex, narrowed and feebly constricted in front, the sides rounded anteriorly and parallel behind; closely punctate, except along the narrow median line. Elytra elongate, transversely or obliquely depressed on the disc below the base, conjointly rounded at the apex; finely punctate-striate, the interstices flat on the disc, convex at the apex, obsoletely uniseriate-punctate. Pygidium rather large, densely punctate. Beneath somewhat closely, the abdomen very sparsely and finely, punctate. Prosternum slightly depressed in the middle behind the subapical groove. Anterior coxæ very narrowly separated.

Length $2\frac{2}{5}$ – $3\frac{1}{4}$, breadth 1 – $1\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO (*coll. Solari*: ♂); GUATEMALA, Trece Aguas in Alta Vera Paz (*Schwarz and Barber, in U.S. Nat. Mus.*: ♀); PANAMA, Volcan de Chiriqui 3000 feet (*Champion*: ♂ ♀).

Six specimens from Chiriqui, one from Guatemala, and one from Mexico, the last-mentioned larger and more robust than the others, but evidently belonging to the same species. Duller and relatively narrower than the Peruvian *D. longirostris* (Kirsch) (the type, ♂, of which is before me), the prothorax more densely punctate, the rostrum slender and greatly elongated in the female, the elytra less depressed below the base. The variation in colour may be due to immaturity.

2. *Dolichobaris schwarzi*, sp. n.

Less elongate and more shining than *D. opaciceps*, nigro-æneous in colour; the head transversely grooved between the eyes; the rostrum only a little longer in the ♂ than in the ♀, the antennæ inserted at (♂) or slightly behind (♀) the middle; the prothorax closely punctate; the elytra less elongate; the anterior

coxae less approximate; the first ventral segment shallowly sulcate down the middle in the ♂, the anterior tibiae with a long apical uncus in this sex.

Length $2\frac{1}{10}$ –3, breadth $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*); GUATEMALA, Las Mercedes, Chiacam, Cahabon (*Champion*), Trece Aguas in Alta Vera Paz (*Schwarz and Barber*, in *U.S. Nat. Mus.*); NICARAGUA, Managua (*Solari*).

Nine specimens. This insect might be taken for a small *Linnobaris*, near *L. pygmaea*, if the exposed pygidium, &c., were not taken into account.

ODONTOBARIS, gen. nov.

Mandibles pointed, almost straight on their inner edge, bidentate on their lower edge externally (fig. 31 *a*); rostrum straight, flat, rather slender, widened in their outer half, the scrobes obliquely descending and sinuous beneath, the antennae inserted at the middle, the scape nearly reaching the eyes, the funiculus 6-jointed, joint 2 a little shorter than 1, obconic, the club short and stout, globose-ovate; head small, the eyes transverse, large; prothorax subquadrate, feebly sinuate at the base; scutellum very small, transverse, hollowed in front; elytra oblong; pygidium exposed, transverse; prosternum with the antecoxal portion convex and unimpressed, the short flattened basal process rounded posteriorly and feebly sulcate down the middle; mesosternum depressed, connate with the metasternum, the epimera large and angularly ascending; anterior coxae separated by considerably less than their own width; ventral segments 2 and 5 equal in length, 1 and 2 connate; femora short, compressed, strongly clavate, unarmed; anterior tibiae deeply excavate at the apex externally, the excavation limited by a sharp tooth; tarsi rather slender, the claws free; body elongate, rather broad, flattened above.

Type, *O. planirostris*.

The Mexican insect forming the type of this genus is the first described Barid with a 6-jointed funiculus, and it also has the mandibles, rostrum, &c. peculiarly formed. The mandibular structure is suggestive of that of *Plocamus*. There is an allied unnamed form from Brazil, placed under the genus *Celetes*, Schönh., in the British Museum*.

1. *Odontobaris planirostris*, sp. n. (Tab. XX. figg. 31, 31 *a*, *b*.)

Shining, black, the tip of the rostrum, antennae, knees, tibiae, and humeri more or less ferruginous; the upper surface clothed with scattered, fine, hair-like, whitish scales, which are uniseriately arranged along each elytral interstice, the vestiture of the under surface a little longer, coarser, and closer, the antennal funiculus and club setose. Head finely punctate; rostrum nearly as long as the head and prothorax, sparsely, finely punctate. Prothorax transverse, narrow and feebly constricted in front, the sides rounded anteriorly and parallel behind; closely punctate. Elytra long, slightly wider than the prothorax, very gradually narrowing from the obtuse humeri; sharply crenate-striate, the interstices rather broad, flat, irregularly uniseriate-punctate. Pygidium densely punctate. Beneath coarsely and densely, the abdomen more sparsely, punctate.

Length $5\frac{1}{2}$, breadth $2\frac{1}{3}$ millim. (♀ ?)

Hab. MEXICO, Cerro de Plumas † (*Höge*).

One specimen, perhaps slightly immature.

* This is a narrow, elongate, polished form, rufous in colour, with a black spot on each elytron towards the apex.

† The name of this locality, as given by the late F. Höge, and quoted throughout this work, is probably a mistake for "Cerro de Palmas," in the State of Vera Cruz.

STICTOBARIS.

Stictobaris, Casey, Ann. N. York Acad. Sci. vi. pp. 466, 516 (1892).

Casey refers three species, from Texas, Arizona, and New Mexico respectively, to this genus, the type being *Onychobaris cribrata*, Lec., which extends into Mexico. They are all oblong, depressed forms, with the rostrum in both sexes short, stout, and abruptly arcuate, the prothorax strongly constricted in front and very coarsely punctate, the elytra rather broad and parallel-sided, the prosternum feebly impressed, the anterior coxæ separated by less than their own width, the tarsal claws divergent.

1. *Stictobaris cribrata*. (Tab. XX. figg. 32, 32 a, ♂.)

Onychobaris cribrata, Lec. Proc. Am. Phil. Soc. xv. p. 296¹.

Stictobaris cribrata, Casey, Ann. N. York Acad. Sci. vi. pp. 516, 517².

Hab. NORTH AMERICA, Waco² in Texas¹.—MEXICO, Acapulco, Jalapa (*Höge*), Guanajuato (*Sallé*), Omilteme in Guerrero (*H. H. Smith*), Gonzales in Hidalgo (*Wickham*).

The five specimens from Mexico agree so nearly with the above-quoted descriptions that there can be little doubt that they belong to Leconte's species, the types of which were probably somewhat abraded. The Mexican insects are sparsely clothed with long, yellowish-white, decumbent, setiform scales, those on the prothorax condensed along the sides and middle, and those on the elytra into a spot on the shoulders, a streak at the base of the third interstice, and a transverse patch on the disc beyond the middle. The rostrum is short, stout, and closely punctate in both sexes, and the first and second ventral segments are slightly depressed down the middle in the male. *S. pimalis*, Casey (an example of which is before me), has the vestiture of the upper surface very much sparser than in *S. cribrata*.

GYMNOBARIS, gen. nov.

Mandibles short, notched within, slightly decussate at the tip; rostrum curved, moderately long, separated from the head by a deep transverse groove, the antennæ inserted at or behind the middle, the antennal club pubescent, stout, oblong-ovate, about as long as joints 2-7 of the funiculus; prothorax transverse, constricted in front, bisinuate at the base, the median lobe slightly impinging on the scutellar cavity; scutellum strongly transverse, flattened; elytra oblong, flattened, finely striate; pygidium fully exposed, small in the ♀, larger in the ♂; prosternum convex or flattened, neither sulcate nor foveate behind the transverse subapical groove, the basal process declivous laterally; mesosternum exposed, connate with the metasternum, the intercoxal portion on almost the same plane as the prosternum; anterior coxæ distant, separated by at least their own width; ventral segments 1 and 2 connate at the middle; femora more or less clavate, not sulcate beneath (except at the knees), the anterior pair sometimes with a short tooth; tarsi rather slender, the claws free; body elongate or oblong-ovate, flattened above, polished, almost glabrous.

Type, *G. brevidens*.

This genus includes two species from Central America, and *Baridius nigerrimus*,

Kirsch, from Bogota *, also belongs to it. They are all oblong, somewhat flattened, polished, subglabrous forms, with widely separated anterior coxæ, finely striate elytra, a non-sulcate, convex or flattened prosternum (much as in *Onychobaris*), non-sulcate femora, and an elongate antennal club. The sternal structure approaches that of the Madarides, but the mesosternum is in great part exposed.

1. *Gymnobaris brevidens*, sp. n. (Tab. XXI. figg. 1, 1 a, ♂.)

Elongate, flattened above, very shining, black, the tarsi and the base of the antennæ reddish or piceous; the punctures of the under surface and legs each bearing a very minute scale. Head minutely punctate; rostrum arcuate, moderately stout and about as long as the head and prothorax in the ♀, a little shorter and thicker in the ♂, sparsely, finely punctate, smoother in the ♀, the antennæ inserted at (♀) or beyond (♂) the middle, the club long and stout. Prothorax subquadrate, constricted and much narrowed in front; sparsely, minutely punctate. Scutellum almost smooth. Elytra long, but little wider than the prothorax, very gradually narrowing from the rounded humeri; feebly striate, the striæ 2-4 very faint or obsolete and each represented by a row of fine punctures, the sutural stria somewhat deeply impressed and conspicuously punctate from a little below the base to the apex, the interstices very broad, flat, and with excessively minute widely scattered punctures. Beneath sparsely punctate. Prosternum somewhat convex. Anterior femora deeply and abruptly excavate near the apex and armed with a short tooth.

Length $3\frac{1}{2}$ -4 $\frac{2}{5}$, breadth $1\frac{1}{2}$ -2 millim. (♂ ♀.)

Hab. NICARAGUA, Chontales (*Janson*: ♂); PANAMA, Bugaba, Volcan de Chiriqui (*Champion*: ♂ ♀).

Four specimens. An elongate, flattened form, with a subquadrate prothorax and faint or almost obsolete dorsal striæ on the elytra, the sutural stria from a little below the base conspicuously punctured and more deeply impressed than the adjacent striæ. The anterior femoral tooth (which is wanting in *G. planipectus* and *G. nigerrimus*) is formed by the abrupt subapical excavation.

2. *Gymnobaris planipectus*, sp. n.

♀. Oblong-ovate, flattened above, very shining, black, the punctures of the under surface and legs each bearing an extremely minute scale. Head minutely punctate; rostrum as long as the head and prothorax, moderately stout, finely punctate, the antennæ inserted at the middle, the club long and stout. Prothorax transverse, gradually and obliquely narrowing from the base, constricted in front; sparsely, minutely punctate. Elytra oblong-subtriangular, very little wider than the prothorax; finely punctate-striate throughout, the interstices flat, with excessively minute scattered punctures, which become uniseriately arranged towards the sides. Prosternum broadly flattened, slightly depressed down the middle, but without trace of a definite sulcus. Anterior coxæ separated by more than their own width. Femora unarmed.

Length 3, breadth $1\frac{2}{3}$ millim.

Hab. GUATEMALA, Volcan de Atitlan 3000 feet (*Champion*).

One female, captured in Dec. 1880, in the vicinity of the coffee-plantations at San Agustin. Smaller and less elongate than *G. brevidens*, the elytra distinctly punctate-striate throughout, the anterior femora unarmed, the prosternum slightly depressed. *G. nigerrimus* (Kirsch), from Bogota, has a narrower prothorax, longer and more convex elytra, and less widely separated anterior coxæ.

* This insect is compared by Kirsch with *Limnobaris T-album* (L.), notwithstanding that the latter has the pygidium covered in both sexes.

ONYCHOBARIS.

Onychobaris, Leconte, Proc. Am. Phil. Soc. xv. p. 294 (1876) (part.) ; Casey, Ann. N. York Acad. Sci. vi. pp. 466, 521.

Twenty-two species* are referred to *Onychobaris* by Casey, who states that the focal-centre of the genus is in the dry regions of Arizona and New Mexico. Of the four southern forms included in it by Solari, *O. dentibia* and *O. armipes* are here placed under *Solaria* (antea, p. 390), and *O. nicaraguensis* (which is nearly related to the N.-American *O. ambigua*, Casey) and *O. punctatissima* differ from all the described species in having at least the anterior femora dentate, a character also shared by *O. senecta*. The principal characters of *Onychobaris* are the more or less widely separated anterior coxæ, the very deeply sinuate base of the prothorax, the feeble prosternal depression, the short, transverse scutellum, and the moderately long, stout, arcuate rostrum. One at least of the N.-American representatives, *O. mystica*, Casey, lives on cactus.

1. ***Onychobaris punctatissima*.** (Tab. XXI. figg. 2, 2 a, ♂.)

Onychobaris punctatissima, Solari, Ann. Mus. Genova, xlii. p. 420 (1906)¹.

Hab. MEXICO (*Mus. Brit.*; *Flohr*), "Sierra de Durango"¹ (*Höge*, in coll. *Solari*), Acapulco (*Höge*).

I have seen seven specimens of this insect, including the type. It has all the femora dentate, the prothorax coarsely, closely punctate, except along the polished median line, and the elytral interstices coarsely seriate-punctate. The first ventral segment is sulcate in the male. Length 3-4, breadth $1\frac{1}{2}$ - $2\frac{1}{10}$ millim.

2. ***Onychobaris nicaraguensis*.**

Onychobaris nicaraguensis, Solari, Ann. Mus. Genova, xlii. p. 421 (1906)¹.

Hab. MEXICO, Ventanas in Durango (*Höge*), Puente de Ixtla (*Wickham*), Temax in N. Yucatan (*Gaumer*); NICARAGUA, Managua (*Solari*¹).

Sent us in numbers from Yucatan. Very like *O. ambigua*, Casey, from Arizona, but with the elytral vestiture darker, finer, and less bristly. The unarmed intermediate and posterior femora and the absence of the smooth median line on the prothorax separate *O. nicaraguensis* from *O. punctatissima*. The first ventral segment is hollowed down the middle in the male.

3. ***Onychobaris senecta*, sp. n.**

Oblong, shining, varying in colour from æneous to black; somewhat thickly clothed with decumbent, pallid, hair-like scales. Head closely punctate, smoother and transversely depressed between the eyes; rostrum moderately stout, arcuate, about as long as the head and prothorax, closely punctate, in the ♀ a little longer and more slender, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax much

* Five only of these are known to me.

broader than long, rounded at the sides anteriorly, strongly constricted in front, deeply bisinuate at the base; closely, finely punctate, except along the smooth median line. Scutellum strongly transverse, hollowed in the middle. Elytra a little wider than the prothorax, very gradually narrowed from the somewhat swollen humeri, undulate on the disc; with narrow, feebly punctured striæ, the interstices broad, flat, very finely, irregularly punctate, becoming transversely strigose towards the sides. Beneath densely, the abdomen more sparsely and finely, punctate; first ventral segment hollowed down the middle in the ♂. Prosternum flattened, transversely hollowed at the apex. Anterior coxæ separated by about twice their own width. Legs densely, rugosely punctate; anterior femora sharply dentate, the others unarmed.

Length $2\frac{7}{8}$ – $4\frac{1}{3}$, breadth $1\frac{1}{4}$ – $2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*; *coll. Solari*), Guanajuato, Puebla (*Sallé*), Jalapa (*Höge*), Toluca (*Wickham*), Tlalpam (*R. H. Hay*, in *U.S. Nat. Mus.*).

This insect has long been known from Mexico, and does duty for *Pseudobaris senescens* in the Sallé collection and for *P. subscabrosa* in the British Museum. It is very different from any of the described species of *Onychobaris* known to me, but possesses all the structural characters of the three other Central-American members of the genus. The finely striate, comparatively smooth, undulate elytra, the abundant vestiture, &c., readily distinguish *O. senecta*. The colour is as variable as in *Pseudobaris acutipennis*.

TREPOBARIS.

Trepobaris, Casey, Ann. N. York Acad. Sci. vii. pp. 466, 519 (1892).

The single N.-American species referred to this genus extends into Mexico, whence three other forms are now added. They differ from *Pseudobaris* in their oblong or subcylindrical form, and in having the prothorax feebly constricted in front and feebly sinuate at the base (the median lobe being short and obtuse), and the elytra not or very little wider than the prothorax. The subcylindrical form of body is still more pronounced in *T. perlonga* than in the type, *T. elongata*, Casey. The rostrum is stout, arcuate, abruptly separated from the head, and bowed from the base. The elytra, as in *Pseudobaris*, sometimes have a small white spot at the base of the third interstice.

1. *Trepobaris perlonga*, sp. n. (Tab. XX. figg. 33, 33 a, ♂.)

Elongate, subcylindrical, shining, black; glabrous above, the punctures on the under surface and legs each bearing a minute white hair-like scale. Head finely punctate, transversely grooved between the eyes; rostrum abruptly bowed from the base, stout, a little longer than the prothorax, closely punctate, smoother in the ♀, the antennæ inserted at (♂) or just behind (♀) the middle, joint 1 of the funiculus elongate, as long as 2-5 united. Prothorax subcylindrical, a little broader than long, arcuately narrowed and feebly constricted in front, and feebly bisinuate at the base; coarsely, closely punctate, and often with an incomplete smooth median line. Elytra elongate, not or very little wider than the prothorax, with narrow feebly punctured striæ, the interstices flat, rather coarsely and closely uniseriate-punctate, 3 not dilated at the base, 9 raised posteriorly. Pygidium densely punctate, convex in the ♂, smaller and flattened in the ♀. Beneath densely, the abdomen more finely and sparsely, punctate, the metasternum and first ventral segment excavate down the middle in the ♂. Prosternal sulcus sharply defined, rather narrow. Femora obsoletely serrulate, without definite tooth. Anterior tibiæ with the apical uncus elongated in the ♂.

Length $3\frac{1}{10}$ – $4\frac{1}{2}$, breadth 1 – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Guanajuato (*Sallé*), Amula in Guerrero (*H. H. Smith*), Cuernavaca in Morelos (*Wickham*; *Barrett*, in *U.S. Nat. Mus.*).

Seventeen specimens, varying greatly in size. The elongate, subcylindrical shape, the long basal joint of the funiculus, and the immaculate elytra readily distinguish *T. perlonga*.

2. *Trepobaris inornata*, sp. n.

Elongate-ovate, narrow, shining, black; glabrous above, the punctures on the under surface and legs each bearing a minute hair-like white scale. Head and rostrum as in *T. perlonga*, the funiculus with joint 1 about as long as 2-4 united. Prothorax nearly as long as broad, convex, very gradually narrowing from near the base, feebly constricted in front; coarsely, closely punctate. Elytra moderately long, very gradually narrowing from the rounded humeri; sharply striate, the interstices flat, each with a regular row of fine scattered punctures, 3 not dilated at the base, 9 raised posteriorly. Anterior femora with a small tooth. First ventral segment slightly hollowed down the middle, and the anterior tibiae with the apical uncus elongated, in the ♂.

Length $3-4\frac{1}{10}$, breadth $1\frac{1}{10}-1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Chilpancingo and Tepetlapa in Guerrero (*H. H. Smith*), Matamoros Izucar in Puebla (*Höge*), Puente de Ixtla (*Wickham*).

Found in numbers at Chilpancingo and Puente de Ixtla. Less elongate and less cylindrical than *T. perlonga*, the basal joint of the funiculus relatively shorter, the interstitial series of punctures in the elytra finer and more scattered.

3. *Trepobaris elongata*.

Trepobaris elongata, Casey, Ann. N. York Acad. Sci. vii. p. 519¹.

Hab. NORTH AMERICA, Texas¹.—MEXICO, Monterey in Nuevo Leon (*Höge*).

One male, agreeing perfectly with a Texan specimen communicated by the Smithsonian Institution, both insects having a few white scales at the base of the third elytral interstice. Casey's description was taken from a single male example. The apical uncus of the anterior tibiae is about equal in length in the two sexes.

4. *Trepobaris yucatana*, sp. n.

Oblong-ovate, rather narrow, shining, black; the elytra with a few small white scales at the base of the third interstice, the punctures of the under surface and legs each bearing a minute hair-like whitish scale. Head finely punctate, transversely grooved between the eyes; rostrum abruptly bowed from the base, moderately stout, a little longer than the prothorax, sparsely, finely punctate. Prothorax broader than long, feebly constricted in front, the sides rounded anteriorly and subparallel behind; closely, moderately coarsely punctate, except along the smooth median line. Elytra slightly wider than the prothorax, gradually narrowing from the rounded humeri; with deep, feebly punctured striae, the interstices flat, regularly uniseriate-punctate, 3 slightly widened at the base. Pygidium closely punctate, large and somewhat convex in the ♂, smaller and vertical in the ♀. Beneath closely, the abdomen more sparsely, punctate; ventral segment 1 shallowly sulcate in the ♂. Presternal sulcus narrow, deep. Femora unarmed. Anterior tibiae with the apical uncus elongated in the ♂.

Length $3\frac{1}{4}-4$, breadth $1\frac{2}{5}-1\frac{9}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Temax in N. Yucatan (*Gaumer*).

Fourteen specimens, mostly in a bad state of preservation. Smaller, narrower, and more shining than *T. elongata*; the prothorax a little more coarsely and not so densely punctate; the seriate punctures in the elytra finer and more scattered; the apical uncus of the anterior tibiæ elongated in the male. The basally widened third elytral interstice separates *T. yucatana* from *T. inornata*.

PSEUDOBARIS.

Heterosternus, Kirsch, Berl. ent. Zeitschr. 1869, p. 215 (nec Dupont).

Pseudobaris, Leeonte, Proc. Am. Phil. Soc. xv. p. 297 (1876); Casey, Ann. N. York Acad. Sci. vi. pp. 466, 552.

This genus is the most numerous in species amongst the Central-American "Baridiides vrais." It is mainly recognizable by the more or less deeply sulcate prosternum (the sulcus, however, is scarcely wide enough to receive the rostrum in repose); the antennal club is pubescent throughout; the femora are usually sulcate beneath, and sometimes dentate; and the rostrum is moderately elongate, at least in the female. Many of the typical forms have the elytral interstices sharply costate on the apical declivity, and the third with a patch of white scales at the base*; others, again, have some additional white markings on the disc or base of the elytra, or their apices subdentate. The type of *Heterosternus* (*H. carbo*, Kirsch) and three of the Central-American species have the prosternal sulcus bifurcate between the coxæ, due to the angular or lanciform extension forwards of the basal process of the prosternum; but they are otherwise so closely related to the typical N.-American *Pseudobaris* that it is inadvisable to separate them†. There is a considerable sexual difference in the form of the rostrum in certain cases, it being often abruptly flattened, smoother, and more slender in the females than in the males. *P. lucida* has the pygidium of the female almost covered by the elytra, though large and prominent in the male. *P. carinipectus* has the prosternal sulcus closed in behind by a v-shaped ridge. The following table will assist in the identification of the Central-American forms:—

A. Prosternal sulcus straight, sometimes extending beyond the coxæ.

[PSEUDOBARIS, Lec.]

a. Pygidium prominent in both sexes, large in ♂, transverse in ♀.

a¹. Basal process of the prosternum longitudinally raised or margined on each side behind the coxæ; femora unarmed; elytra with spots or lines of white scales at the base and middle, those at the base mainly condensed on the interstices 2 and 6.

a². Elytra with a submedian spot on the 4th interstice, and another at the base of the 2nd and 6th Species 1-3.

* These scales are often partially abraded, but the additional squamigerous punctures remain to indicate their position; the interstice itself, too, is often widened at this place.

† The S.-American *Baridius puncticollis*, Boh., and *B. subcaneus*, Kirsch, also belong here, and *B. corvinus*, Kirsch, to *Pseudobaris*, s. str.

- b*². Elytra with a sharply-defined transverse submedian fascia and a spot at the base of the 2nd and 6th interstices; ventral surface densely and coarsely albo-squamose Species 4.
- c*². Elytra with short streaks at the base and across the middle, and sometimes a line along the suture; ventral surface sparsely albo-squamose.
- a*³. Mesosternum not hollowed between the coxæ Species 5-8.
- b*³. Mesosternum hollowed between the coxæ Species 9.
- b*¹. Basal process of the prosternum not or feebly margined at the sides (except in *P. navius*), usually flattened; elytra with or without a white spot at the base of the 3rd interstice (in *P. octonotata* with an additional spot at the base of the interstices 4-6).
- d*². Elytra without angular prominences at the apex.
- c*³. Anterior femora bi-, the others uni-dentate.
- a*⁴. Rostrum sharply carinate beneath; elytra with some squamigerous punctures at the base of the 3rd interstice, undulate, completely striate Species 10.
- b*⁴. Rostrum not sharply carinate beneath; elytra bare, flattened, incompletely striate at the base Species 11.
- d*³. Anterior femora, and sometimes the others also, with an angular prominence or tooth* (the anterior pair serrulate in *P. carinipectus*).
- c*⁴. Elytra with three or four spots at the base Species 12.
- d*⁴. Elytra with a spot or a few scales at the base of the 3rd interstice, which is usually widened in front.
- a*⁵. Prosternal sulcus closed behind by a v-shaped ridge; elytra also with scattered white setæ Species 13.
- b*⁵. Prosternal sulcus open behind.
- a*⁶. Elytra also with scattered fascicles of setiform white scales Species 14, 15.
- b*⁶. Elytra also with conspicuous scattered white setæ Species 16-18.
- c*⁶. Elytra without white setæ.
- a*⁷. Elytra incompletely striate near the suture at the base Species 19.
- b*⁷. Elytra completely striate.
- a*⁸. Interstices very finely punctured Species 20.
- b*⁸. Interstices coarsely punctured Species 21.
- e*⁴. Elytra bare, the 3rd interstice not widened in front Species 22, 23.
- e*³. Anterior femora, and the others also, unarmed.
- f*⁴. Elytra with a spot or a few scales at the base of the 3rd interstice (abraded in *P. lucens*), which is usually more or less widened in front.
- c*⁶. Elytra also with conspicuous scattered white setæ Species 24, 25.
- d*⁵. Elytra also with inconspicuous whitish setæ (often abraded) Species 26.

* This character is perhaps not altogether reliable, as some of the species placed under *e*³ have indications of a small tooth.

- e³. Elytra without setæ.
- d⁶. Body elongate Species 27.
- e⁶. Body oblong-ovate Species 28-33.
- g⁴. Elytra bare, the 3rd interstice not widened at the base. Species 34-39.
- e². Elytra each with a dentiform or angular prominence at the apex.
- f³. Anterior femora finely denticulate; elytra with a white spot at the base of the 3rd interstice Species 40.
- g³. Anterior femora unarmed.
- h⁴. Elytra with a white spot at the base of the 3rd interstice Species 41-44.
- i⁴. Elytra bare Species 45-47.
- b. Pygidium almost covered by the elytra in the ♀, large and prominent in the ♂; body brilliantly metallic æneous Species 48.
- B. Prosternal sulcus divided between the coxæ by an angular or lanceiform projection of the flattened or shallowly sulcate basal process; elytra bare. [HETEROSTERNUS, Kirsch.]
- c. Elytra without angular prominences at the apex Species 49, 50.
- d. Elytra each with an angular prominence at the apex Species 51.

1. *Pseudobaris biguttata*, sp. n. (Tab. XXI. figg. 3, 3 a, b, ♂.)

Oblong-ovate, rather broad, very shining, black; the elytra with a small, sharply-defined, oval or rounded patch of narrow white scales on the 4th interstice at a little beyond the middle, an inconspicuous patch at the base of the 2nd and 6th, and sometimes another on the 6th in a line with the larger one on the 4th; the punctures of the under surface and legs each bearing a small hair-like white scale. Head sparsely punctate, transversely depressed between the eyes; rostrum abruptly bowed from the base, a little longer than the prothorax, stout, flattened at the tip, sparsely punctate and longitudinally strigose in the ♂, smoother in the ♀, the antennæ inserted at about the middle in both sexes, the outer joints of the funiculus strongly transverse, the club short-ovate, stout, pointed at the tip. Prothorax transverse, obliquely narrowing from the base, and strongly constricted in front; the surface with minute, widely scattered punctures, which become more distinct towards the sides and along the basal margin. Elytra moderately long, gradually narrowing from the oblique humeri, transversely flattened or depressed below the base; faintly punctate-striate, the striæ becoming deeply impressed towards the sides and apex, the 4th sinuous exterior to the white spot, the interstices broad, flat, each with a row of excessively minute punctures, and some additional impressions on the squamose spaces. Beneath coarsely, the middle of the metasternum and the abdomen very sparsely and finely, punctate; first ventral segment flattened down the middle in the ♂. Prosternum deeply sulcate, the basal process broad, tumid on each side, margined laterally, and deeply arcuate-emarginate behind (fig. 3 b). Anterior coxæ separated by a little less than their own width. Femora unarmed.

Length 6-6 $\frac{3}{4}$, breadth 3-3 $\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*Mus. Brit.*; *Mus. Dresden*; *Höge, in coll. Solari*), Toxpam, Playa Vicente, and San Andres Tuxtla, all in Vera Cruz (*Sallé*); PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

Seven examples, the one from Chiriqui having the single larger spot only on the elytra (which is placed in exactly the same position as in *Centrinus dispilus*, Schönh.) and the prothorax more rapidly narrowed from the base. The deeply emarginate basal process of the prosternum is characteristic of this species.

2. *Pseudobaris disparilis*, sp. n. (Tab. XXI. figg. 4, 4 α , 4 φ .)

Oblong-ovate, very shining, black; the elytra with a small, oblong patch of narrow white scales on the 4th interstice at a little beyond the middle and sometimes a few white scales at the base of the 2nd, the punctures of the legs and under surface each bearing a minute hair-like white scale. Head finely punctate, the frons depressed or with a shallow longitudinal groove; rostrum (σ) arcuate, moderately stout, about as long as the head and prothorax, finely punctate, (φ) smoother, more slender, and greatly elongated, reaching the middle of the metasternum, the antennæ inserted at about the basal third in the φ and towards the middle in the σ , the funiculus rather slender, the club ovate. Prothorax subconical, constricted in front; very sparsely, finely punctate. Elytra transversely flattened or depressed at and below the base, with feebly punctured, sharp, narrow striæ, the interstices broad, almost smooth and flat, the 2nd slightly widened at the base. Beneath coarsely, the abdomen very sparsely and finely, punctate. Prosternum deeply sulcate, the basal process margined laterally and truncate or feebly emarginate behind. Anterior coxæ separated by considerably less than their own width. Femora unarmed.

Length $5\frac{1}{2}$ –6, breadth $2\frac{2}{5}$ –3 millim. (σ φ .)

Hab. MEXICO, Toxpan and Playa Vicente in Vera Cruz (Sallé).

Two males and three females, the sexes labelled as distinct species in the Sallé collection. Smaller than *P. biguttata*, the elytra sharply striate throughout, the prosternal process less developed and truncate or feebly emarginate behind, the funiculus not so stout, the antennal club ovate, the rostrum greatly elongated in the female.

3. *Pseudobaris sexguttata*, sp. n. (Tab. XXI. figg. 5, 5 α , 5 φ .)

Subovate, very shining, black; the elytra each with three small dense patches of narrow white scales—one at the base of the 2nd interstice, another at the base of the 6th, and one on the 4th at a little beyond the middle,—and sometimes two or three similar scales on the 6th in a line with those on the 4th; the punctures on the under surface and legs each bearing a white scale, those on the sternal side-pieces oval in shape. Head closely punctate, transversely depressed between the eyes; rostrum strongly arcuate, stout, nearly as long as the head and prothorax, closely punctate, smoother at the tip in the φ . Prothorax transverse, rapidly narrowed from the base, strongly constricted in front; sparsely, coarsely punctate, the disc sometimes with a few widely scattered minute punctures only. Elytra rounded-triangular, depressed along the suture, with sharply cut, feebly punctured striæ, the interstices broad, flat, and almost smooth (except upon the squamose spots). Beneath very coarsely, the abdomen finely, punctate. Prosternum deeply sulcate, the basal process with a very prominent, cariniform ridge on each side, hollowed within, and slightly emarginate behind. Anterior coxæ separated by considerably less than their own width. Legs short; femora unarmed.

Length $2\frac{2}{5}$ –4, breadth $1\frac{1}{4}$ – $2\frac{1}{10}$ millim. (σ φ .)

Hab. MEXICO, Santa Lucrecia in Vera Cruz (Knab, in *U.S. Nat. Mus.*), Jalapa (Smith, ex Wickham); GUATEMALA, Cahabon, Cerro Zunil (Champion); NICARAGUA, Ometepe 4000 feet (Shimek, ex Wickham), Chontales (Janson), Managua (Solari); PANAMA, Volcan de Chiriqui, Bugaba (Champion).

Eleven specimens, varying greatly in size, and in the puncturing of the prothorax, the disc (except along the basal margin) being sometimes almost smooth. *P. sexguttata* is readily distinguished by the three sharply-defined white spots on each elytron and its subovate shape. The coarse punctures on the under surface each bear a rather large oblong white scale. The rostrum is of about the same length in the two sexes.

4. *Pseudobaris niveoguttata*, sp. n. (Tab. XXI. figg. 6, 6 α , 2 φ .)

♀. Oblong-elliptic, narrow, very shining, black; the prothorax with a sinuous stripe on each side extending down the anterior part of the flanks, and the elytra with several spots at the base (that on the 2nd and 6th interstices larger than the others) and a transverse fascia at a little beyond the middle of the disc, thickly clothed with rather large, oblong, white scales; the under surface (a large space on the propleura and the sides of the ventral segments 1 and 2 excepted) densely and coarsely albo-squamose, the legs with narrower white scales. Head closely, finely punctate, transversely grooved and feebly foveate between the eyes; rostrum moderately curved, rather slender, a little longer than the head and prothorax, finely punctate at the base, the antennæ inserted behind the middle. Prothorax transverse, narrowing from the base, constricted in front; somewhat coarsely punctate at the sides, apex, and along the basal margin, almost smooth on the disc. Elytra scarcely wider than the prothorax, oblong, compressed at the sides below the humeri, depressed along the suture; with sharply cut, feebly punctured striæ, the interstices almost smooth (except upon the squamose spaces), flat. Pygidium vertical, rather large. Beneath closely, the bare spaces at the sides of the ventral segments 1 and 2 sparsely, punctate. Prosternal sulcus deep, squamose, the basal process broad, slightly raised on each side. Anterior coxæ separated by a little more than half their own width. Femora unarmed.

Length $3\frac{2}{5}$ – $4\frac{1}{10}$, breadth $1\frac{1}{2}$ – $1\frac{7}{8}$ millim.

Hab. MEXICO, Jalapa (*Höge*).

Two females. An oblong form, with sharply-defined patches of rather coarse, imbricate, white scales on the elytra, the elytra themselves compressed at the sides anteriorly and scarcely wider than the prothorax, the rostrum (♀) long and slender (as in *P. disparilis*, ♀), the under surface in great part densely albo-squamose.

5. *Pseudobaris sinuosa*, sp. n. (Tab. XXI. figg. 7, 7 α , 3 φ .)

♂. Oblong-ovate, robust, very shining, black; the elytra with a common, subtriangular scutellar patch, a small patch at the base of the 5th interstic, and an interrupted, transverse, post-median fascia clothed with scattered narrow white scales; the punctures of the under surface and legs each bearing a hair-like white scale. Head closely punctate, transversely depressed and foveate between the eyes; rostrum strongly arcuate, very stout, about as long as the head and prothorax, strigose and closely punctate, smooth along the middle, the antennæ inserted midway, stout, the club ovate. Prothorax rather convex, transverse, conical, strongly constricted in front; with a few minute widely scattered punctures on the disc, these becoming coarser towards the sides. Elytra oblong-subtriangular, undulate, with feebly punctured narrow striæ, the striæ sinuous on the disc and deeply impressed at the apex, the first not reaching the base, the interstices almost smooth (except on the squamose spaces), flat, convex towards the tip. Pygidium broad, somewhat convex. Beneath coarsely, the abdomen sparsely and finely, punctate. Prosternum deeply sulcate, the basal process short, almost smooth, transversely hollowed, margined at the sides, and feebly emarginate behind. Femora unarmed. Anterior tibiæ with a stout apical uncus.

Length $5\frac{1}{4}$, breadth $2\frac{1}{2}$ millim.

Hab. MEXICO, Cordova (*Höge*).

One male. Distinguishable by the very stout rostrum and the undulate elytra, the latter with sinuous dorsal striæ and the white scales condensed into a subtriangular scutellar patch and an interrupted transverse post-median fascia.

6. *Pseudobaris irregularis*, sp. n. (Tab. XXI. figg. 8, 8 α , 2 φ .)

Oblong-ovate, somewhat flattened above, very shining, black, the antennæ and tarsi obscure ferruginous; the sides of the prothorax, the elytra, under surface, and legs very sparsely clothed with small, hair-like,

white scales, those on the elytra condensed into fascicles and interrupted lines, which are widened on the interstices 2, 4, and 6, and conspicuous at the base and across the middle. Head closely punctate, depressed between the eyes; rostrum abruptly bowed from the base, stout, about as long as the head and prothorax, slightly dilated at the apex, strigoso-punctate, a little longer and smoother in the ♀, the antennæ inserted just behind the middle in both sexes, the antennal club ovate. Prothorax transverse, narrowing from the base, strongly constricted in front; somewhat coarsely punctured at the apex, along the basal margin, and at the sides, almost smooth on the disc. Elytra oblong, very gradually narrowing from the base, more or less undulate on the disc; finely punctate-striate, the striæ deeply impressed at the apex, the interstices broad, flat, and almost smooth (except on the squamose spaces), 7-9 subcostate at the tip. Pygidium large in the ♂, smaller and more transverse in the ♀, densely punctate. Beneath very coarsely, the abdomen sparsely and finely, punctate. Prosternum somewhat deeply sulcate, the basal process broad, closely punctured, flat, margined laterally, and subtruncate behind. Anterior coxæ separated by about their own width. Femora unarmed.

Length $4\frac{1}{2}$ - $5\frac{1}{10}$, breadth $2\frac{1}{10}$ - $2\frac{3}{5}$ millim. (♂ ♀.)

Hab. MEXICO (*Sallé*), Paso del Macho (*Höge*).

One male and two females, doubtless all from the State of Vera Cruz. Less robust and more depressed than *P. sinuosa*, the rostrum not so stout, the prothorax with a row of rather coarse punctures along the basal margin, the sparse white vestiture of the elytra arranged in longitudinal streaks, the laterally margined basal process of the prosternum flattened and closely punctate.

7. *Pseudobaris suturalis*, sp. n.

Oblong, robust, shining, black, the antennæ obscure ferruginous; the elytra with the suture to near the tip, a small oblong patch at the base of the interstices 2 and 6, and an irregular transverse submedian fascia, clothed with rather coarse, setiform, white scales, the sides of the prothorax, the under surface, and legs also clothed with small narrow white scales. Head closely punctate, transversely grooved between the eyes; rostrum moderately stout, arcuate, not longer than the prothorax, closely punctate. Prothorax transverse, gradually, arcuately narrowing from near the base, strongly constricted in front; closely punctate, except along the median line. Elytra rather elongate, very gradually narrowing from the base, depressed along the suture, the disc also transversely hollowed beyond the middle; deeply sulcate, the sulci feebly punctate, the interstices flat, finely and irregularly uniseriate-punctate. Beneath closely punctate. Prosternum deeply sulcate, the basal process raised on each side and emarginate behind. Legs stout; femora unarmed.

Length 5, breadth $2\frac{3}{5}$ millim. (♀ ?)

Hab. MEXICO, Cuernavaca in Morelos (*Wickham*).

One specimen, captured during Mr. Wickham's recent trip to Western Mexico. A rather large, oblong, robust form nearly related to *P. sublineata*, with the elytra conspicuously bordered with white scales along the suture and the striæ broader and deeper, the ventral surface closely punctate, &c.

8. *Pseudobaris sublineata*, sp. n.

♂. Oblong-ovate, very shining, black, the antennæ and tarsi fusco-ferruginous; the elytra with scattered uniseriately arranged setiform white scales at the base, middle, and apex, the interstices 1 and 2 each with a few additional scales in front; the punctures on the sides of the prothorax, under surface, and legs each bearing a small white scale. Head closely punctate, transversely grooved between the eyes; rostrum stout, arcuate, about as long as the prothorax, finely punctate. Prothorax transverse, narrowing

from the base, strongly constricted in front; sparsely punctate, the punctures becoming finer on the middle of the disc. Elytra oblong-subtriangular, depressed along the suture, with feebly punctured, deep striæ, the interstices flat, finely uniseriate-punctate, 2 and 3 with several additional punctures at the base. Pygidium large, closely punctate. Beneath closely punctate, the first ventral segment with a smooth flattened space in the middle. Prosternum deeply sulcate, the flattened basal process sharply margined laterally and the ridges produced into a dentiform prominence on each side behind. Femora unarmed, the anterior pair clavate, the others sulcate. Anterior tibiæ with a long apical uncus.

Length $3\frac{1}{2}$ – $3\frac{3}{4}$, breadth $1\frac{2}{3}$ – $1\frac{3}{4}$ millim.

Hab. MEXICO, Playa Vicente (*Sallé*), Atoyac (*H. H. Smith*).

Two males, both from the State of Vera Cruz. In this insect the scattered white setiform scales on the elytra tend to form a faint interrupted basal and median fascia, and there are a few additional scales at the base of the first and second interstices. *P. irregularis* and *P. sinuosa* are somewhat closely allied to the present species.

9. *Pseudobaris fraterculus*, sp. n.

♂. Oblong-ovate, narrow, rather convex, shining, nigro-piceous, the antennæ and tarsi obscure ferruginous; the elytra with a short streak of hair-like white scales at the base of the interstices 2 and 6, and a shorter or longer streak on 2–6 at a little beyond the middle (the one on 2 elongate); the punctures of the under surface and legs each bearing a small, hair-like, white scale. Head closely punctate, transversely grooved between the eyes; rostrum abruptly bowed from the base, stout, closely punctate, the antennal club large. Prothorax transverse, constricted in front, the sides parallel at the base; closely, coarsely punctate, except along the narrow abbreviated smooth median space. Elytra slightly depressed along the suture, sharply punctate-striate, the interstices flat and feebly uniseriate-punctate. Pygidium transverse, rather small. Beneath coarsely, the abdomen finely, punctate, the first ventral segment hollowed down the middle. Prosternal sulcus broad, extending to the base, the basal process raised on each side behind the coxæ, the lateral ridges becoming dentiform posteriorly. Mesosternum depressed between the middle coxæ. Femora unarmed.

Length 3, breadth $1\frac{1}{4}$ millim.

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*).

One male. Smaller and narrower than *P. sublineata*, the rostrum more abruptly bowed from the base, the prothorax coarsely punctate throughout and parallel at the sides behind, the scales on the elytra much smaller, the prosternum sulcate to the base, the intercoxal portion of the mesosternum depressed for the reception of the tip of the rostrum, the first ventral segment (♂) shallowly sulcate.

10. *Pseudobaris costirostris*, sp. n. (Tab. XXI. figg. 9, 9 a, ♂.)

♂. Oblong-ovate, very shining, black, glabrous above (? slightly abraded), the punctures of the under surface and legs each bearing a minute white scale. Head closely, finely punctate, transversely hollowed and almost smooth between the eyes; rostrum abruptly separated from the head, very stout, about as long as the head and prothorax, with an exceedingly prominent carina extending down the middle beneath, finely punctate and longitudinally strigose above. Prothorax convex, a little broader than long, narrowing from the base, constricted in front; sparsely, finely punctate, smooth along the median line. Scutellum strongly transverse, concave. Elytra undulate, finely punctate-striate, the interstices broad, flat, narrowly costate on the apical declivity, each with a row of excessively minute punctures, the third with several additional impressions at the base. Beneath very coarsely, the abdomen sparsely and finely,

punctate. Prosternum with the median sulcus extending to the apex, deep, sharply margined, the margin abruptly angulate behind the coxæ, the hollowed basal process short, truncate behind. Anterior femora with two teeth (one on each edge of the sulcus), the others with one tooth only.
Length $4\frac{1}{2}$, breadth $2\frac{1}{10}$ millim.

Hab. GUATEMALA, Las Mercedes 3000 feet (*Champion*).

One male. Not unlike the common *P. undulata*, but easily recognizable by the longer prosternal sulcus, the sharp carina on the lower face of the rostrum (an unusual character among the Barids), the dentate femora, &c. The inferiorly carinate rostrum (fig. 9 a), the longer sulcus and less developed basal process of the prosternum, &c., separate *P. costirostris* from *P. oscillans*. The small punctures at the base of the third elytral interstice doubtless bear scales when the insect is in fresh condition.

11. *Pseudobaris oscillans*, sp. n. (Tab. XXI. figg. 10, 10 a, b, ♂.)

Oblong-ovate, very shining, black, glabrous above, the punctures of the under surface and legs each bearing a minute white scale. Head finely punctate, transversely depressed between the eyes; rostrum (♂) stout, about as long as the head and prothorax, finely punctate, (♀) longer, more strongly arcuate, and much smoother, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax slightly broader than long, conical, feebly constricted in front; very sparsely, minutely punctate, smooth along the median line. Elytra transversely depressed before and behind the humeri, the basal margin prominent; with fine, faintly punctured striæ, the first almost or quite obsolete at the base and there represented by a line of minute punctures, the interstices broad, flat, narrowly costate on the apical declivity, each with a row of extremely minute scattered punctures. Beneath very coarsely, the abdomen sparsely and finely, punctate. Prosternum with the median sulcus deep, parallel-sided, and abruptly terminating between the coxæ, the basal process flat and subtruncate. Legs rather slender; anterior femora bi-, the others uni-dentate.

Length $4-4\frac{1}{10}$, breadth $1\frac{3}{4}-2$ millim. (♂ ♀.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One pair. Very like *Madarus astutus*, but smaller, the rostrum of the female stouter, cylindrical, and not abruptly gibbous at the base, the femora sharply dentate, the apical interstices of the elytra costate, the basal process of the prosternum less developed, &c. Both insects have a prominent basal margin to the elytra. The femora in the present species are sharply dentate, the two teeth on the anterior pair (fig. 10 b) being placed opposite one another, one on each edge of the sulcus.

12. *Pseudobaris octonotata*, sp. n. (Tab. XXI. figg. 11, 11 a, ♀.)

Oblong-ovate, shining, black; the elytra each with four dense albo-squamose spots at the base, the one on the 3rd interstice larger and more elongate than those exterior to it; the punctures on the under surface and legs each bearing a hair-like white scale. Head finely punctate, transversely depressed between the eyes; rostrum arcuate, stout, nearly as long as the head and prothorax, closely punctate, in the ♀ smoother, longer, and more slender, the antennæ inserted at about the middle. Prothorax transverse, rather convex, rounded at the sides anteriorly, constricted in front; closely, coarsely punctate. Elytra rounded-triangular, with sharply cut, narrow, feebly punctured striæ; the interstices broad, flat, narrowly costate at the apex, each with a row of fine, shallow, transverse punctures, 3 widened at the base. Beneath closely punctate. Prosternal sulcus straight, shallow, broad. Anterior and intermediate femora with a short tooth.

Length $2\frac{1}{2}-3\frac{1}{4}$, breadth $1\frac{1}{6}-1\frac{3}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Motzorongo in Vera Cruz (*Osborn, in U.S. Nat. Mus.*: ♀); PANAMA, San Feliz in Chiriqui (*Champion*: ♂).

Three specimens, the female (fig. 11) with larger white patches at the base of the elytral interstices 3-6, the one on 3 being more extended than the rest in all of them. This insect resembles *P. binotata*, but the elytral interstices are more finely punctate, the scattered white setæ are wanting, the anterior femora are distinctly dentate, and the rostrum of the female is more elongate.

13. *Pseudobaris carinipectus*, sp. n. (Tab. XXI. figg. 12, 12 *a*, *b*, ♂.)

Oblong, very shining, black; the elytral interstices clothed with long, coarse, scattered, seriatly-arranged, decumbent, white setæ, the third also with a dense oblong patch of hair-like white scales at the base; the punctures on the under surface and legs each bearing a small white scale. Head closely punctate, transversely grooved between the eyes; rostrum arcuate, very stout, not longer than the head and prothorax, densely punctate, flattened at the tip in the ♀, the antennæ inserted at about the middle. Prothorax much broader than long, transversely convex, strongly constricted in front, deeply bisinuate at the base, the sides rounded anteriorly and parallel behind; closely, moderately coarsely punctate, except along the smooth median line. Elytra oblong, gradually narrowing from the base, feebly transversely depressed on the disc before and beyond the middle; narrowly punctate-striate, the interstices broad, finely and irregularly uniseriate-punctate, flat to near the tip, 3 widened at the base, 9 raised at the apex. Pygidium large, densely punctate, somewhat tumid in the ♂, flattened and vertical in the ♀. Beneath closely punctate; first ventral segment slightly hollowed down the middle in the ♂. Prosternal sulcus rather broad, deep, parallel-sided, limited behind the coxæ by a prominent v-shaped ridge (fig. 12 *b*). Anterior femora distinctly serrate, the others with an almost obsolete tooth. Anterior tibiæ with a short tooth at the inner apical angle, in addition to the usual uncus.

Length 4-5½, breadth 2-2⅔ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca (*Sallé*); GUATEMALA, Dueñas (*Champion*).

Found in numbers at Dueñas. More oblong than *P. undulata*; the elytral interstices not sharply carinate at the apex, more finely punctate, and sparsely albo-setose; the prosternal sulcus margined posteriorly and receiving the antennal club in repose. This last-mentioned character is suggestive of *Aulobaris*, but the antennæ have a short second joint to the funiculus as in *Pseudobaris*.

14. *Pseudobaris fasciculata*, sp. n. (Tab. XXI. figg. 13, 13 *a*, *b*, ♂.)

Oblong-ovate, moderately convex, rather broad, shining, black; the elytra with small scattered fascicles of rather coarse, white, setiform scales (fig. 13 *b*) on the interstices 3, 5, 7, and 9, and a larger spot at the base of 3, as well as seriatly-arranged smaller setiform scales on the rest of their surface; the sides of the prothorax, the under surface, and legs sparsely clothed with small hair-like white scales. Head closely punctate, transversely grooved between the comparatively small eyes; rostrum stout, arcuate and shorter than the prothorax in the ♂, abruptly bowed and slightly longer in the ♀, closely, somewhat coarsely punctate, the antennæ inserted at about the middle, joint 2 of the funiculus very little longer than 3. Prothorax transverse, moderately convex, strongly constricted in front, rounded at the sides anteriorly; closely, coarsely punctate, except along the smooth median line. Elytra with sharply-cut, feebly-punctured striæ, the interstices flat, broad, and closely, irregularly biseriate-punctate on the disc, narrower and coarsely uniseriate-punctate towards the sides. Pygidium vertical, densely punctate. Beneath closely punctate; first ventral segment slightly hollowed along the middle in the ♂. Prosternal sulcus rather shallow. Femora obsoletely dentate.

Length 4-4½, breadth 2-2⅓ millim. (♂ ♀.)

Hab. MEXICO, Toxpan and Juquila (*Sallé*); GUATEMALA, Capetillo (*Champion*).

Three specimens. Easily known by the short rostrum and the fasciculate arrangement of the elytral vestiture. *P. fasciculata* is perhaps nearest related to *P. senescens*, but it has the scales on the elytra clustered into small spots as in *P. multiguttata*.

15. ***Pseudobaris multiguttata***, sp. n. (Tab. XXI. figg. 14, 14 a, ♂.)

♂. Oblong, flattened above, moderately shining, black; the elytra with small scattered fascicles of yellowish-white setiform scales on the interstices 3, 5, 7, and 9, and a large oval ochreous spot at the base of 3, as well as seriatly-arranged minute pallid scales on the rest of their surface; the sides of the prothorax, the under surface, and legs sparsely clothed with fine, hair-like, whitish scales. Head closely punctate, flattened between the eyes; rostrum arcuate, moderately stout, about as long as the prothorax, closely, finely punctate, the antennae inserted just beyond the middle. Prothorax transverse, subquadrate, constricted in front, rounded at the sides anteriorly; densely and somewhat finely punctate, except along the smooth median line. Elytra oblong, with feebly punctured striae, the interstices flat, densely punctate, 3 much widened at the base. Pygidium broad, densely punctate. Beneath closely punctate; ventral segments 1 and 2 excavate down the middle. Prosternal sulcus shallow. Femora clavate, the anterior pair obsoletely dentate.

Length 4, breadth $1\frac{1}{2}$ millim.

Hab. MEXICO, Ciudad in Durango 8100 feet, Ventanas (*Forrer*).

Two males, the one from Ventanas abraded. Differs from *P. fasciculata* in its oblong shape, duller surface, densely and less coarsely punctured prothorax, more finely and closely punctured elytral interstices (the third with a large ochreous spot at the base), longer and smoother rostrum, and deeply excavate first ventral segment in the male.

16. ***Pseudobaris leucostigma***, sp. n. (Tab. XXI. figg. 15, 15 a, ♂.)

Oblong-ovate, very shining, black, sometimes with a brassy lustre; the elytra with a rather large, dense, oval patch of white scales at the base of the third interstice and various coarse, narrow, elongate-oval, white scales along the alternate interstices 3, 5, 7, and 9; the punctures at the sides of the prothorax and on the underside and legs each bearing a hair-like white scale. Head closely, minutely punctate, transversely grooved between the eyes; rostrum moderately stout, curved, slightly longer than the prothorax, closely punctate, smoother and flattened at the tip in the ♀, the antennae inserted near the middle. Prothorax transverse, rather convex, constricted and much narrowed in front, the sides rounded anteriorly and subparallel behind; very sparsely, finely punctate on the disc, the punctuation becoming coarser and more crowded towards the sides. Elytra with feebly punctured fine striae, the interstices broad, flat, and each with a scattered irregular row of very minute punctures, 3 considerably widened at the base. Beneath closely punctate; first ventral segment slightly depressed along the middle in the ♂. Prosternum with a deep straight sulcus. Anterior and intermediate femora obsoletely dentate.

Length $2\frac{1}{2}$ -3, breadth $1\frac{1}{10}$ - $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO (*coll. Solari*), Toxpan (*Sallé*), Cordova (*Sallé, Höge*), Jalapa (*Höge*); GUATEMALA, Lanquin, Chiacam, Senahu, Capetillo, Guatemala city (*Champion*); HONDURAS (*Sallé*).

Fourteen examples. Larger and much smoother than *P. cylindricollis*, the finer vestiture on the elytra wanting, the basal spot larger, the long scattered scales on the alternate interstices broader, the disc of the prothorax very sparsely, finely punctate, the punctures on the elytral interstices minute and widely separated.

17. *Pseudobaris cylindricollis*, sp. n. (Tab. XXI. figg. 16, 16 a, ♂.)

Oblong-ovate, shining, black; the sides of the prothorax, the elytra, under surface, and legs sparsely clothed with very fine, hair-like, white scales, the elytra with a dense oblong patch of coarser scales at the base of the third interstice and various scattered long white decumbent setæ, these latter placed on the interstices 3, 5, 7, and 9 and intermixed with the uniseriately-arranged finer vestiture. Head closely, finely punctate, transversely depressed between the eyes; rostrum stout, strongly arcuate, about as long as the prothorax, closely punctate, the antennæ inserted at the middle in both sexes. Prothorax transverse, rather convex, subcylindrical, abruptly and arcuately narrowed in front; coarsely, closely punctate. Elytra considerably wider than the prothorax, gradually narrowing from the rounded humeri; deeply punctate-striate, the interstices closely and finely uniseriate-punctate, 3 widened at the base. Beneath closely punctate; first ventral segment slightly depressed along the middle in the ♂. Prosternal sulcus deep, straight. Anterior femora with a short tooth.

Length $2-2\frac{3}{5}$, breadth $\frac{7}{8}-1\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Toxpam (*Sallé*), Chilpancingo (*H. H. Smith*), Puente de Ixtla (*Wickham*); GUATEMALA, Guatemala city (*Salvin*, *Champion*), San Joaquín, San Gerónimo (*Champion*); NICARAGUA, Managua, Corinto (*Solari*); COSTA RICA, Patarra 1300 metres (*Biolley*).

Found in abundance at Guatemala city. A small narrow form* nearly related to the N.-American *P. nigrina* (Say), but with a subcylindrical, more coarsely and less densely punctured prothorax, &c. The finer vestiture is soon abraded, but the long scattered setæ and the white basal spot on the elytra are always conspicuous. The sexes are scarcely distinguishable, except by the form of the pygidium. The smaller specimens superficially resemble the N.-American *Plesiobaris disjuncta*.

18. *Pseudobaris nævius*, sp. n.

♂. Oblong-ovate, rather convex, shining, black; the elytra with a few scattered long, coarse, decumbent white setæ on the alternate interstices 3, 5, 7, and 9, the third with a small patch of narrow whitish scales at the base, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, stout, nearly as long as the head and prothorax, closely strigose-punctate, the antennæ inserted at the middle. Prothorax transverse, strongly constricted in front, the sides rounded anteriorly and parallel at the base; sparsely punctate, except along the smooth median line. Elytra slightly wider than the prothorax, depressed along the suture anteriorly, the humeri not prominent; finely punctate-striate, the interstices broad, flat, narrowly costate at the apex, each with a row of scattered very minute punctures, the third widened at the base. Pygidium large, convex. Beneath sparsely, the abdomen very finely, punctate; first ventral segment deeply sulcate. Prosternum deeply sulcate from the apex to the base. Legs short; femora stout, feebly dentate; anterior tibiæ strongly, the others more feebly, unguiculate.

Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim.

Hab. GUATEMALA, Tamahu in Vera Paz (*Champion*).

One somewhat abraded male. A small black form superficially resembling *P. callosipennis*, with rounded apices to the elytra, a stouter rostrum, a longer and deeper prosternal sulcus, stouter and feebly dentate femora, &c., the first ventral segment (♂) deeply sulcate. Smoother than *P. cylindricollis*, the elytra finely striate, &c.

* The insect is a little narrower than represented on the Plate.

19. *Pseudobaris atitlana*, sp. n. (Tab. XXI. figg. 17, 17 *a*, *b*, ♂.)

- ♂. Oblong-ovate, very shining, black, the elytra with a small spot of white scales at the base of the third interstice, the punctures of the under surface and legs each bearing a minute white scale. Head finely punctate, transversely depressed between the eyes; rostrum strongly arcuate, about as long as the head and prothorax, stout, slightly flattened at the tip, closely, rather coarsely punctate. Prothorax conical, constricted in front, sparsely, finely punctate, smooth along the median line. Scutellum transverse, smooth, flat. Elytra somewhat undulate, with rows of small oblong punctures placed in fine striae, the first and second striae becoming almost obsolete at the base, the interstices broad, flat, narrowly costate on the apical declivity, each with a row of excessively minute punctures. Beneath very coarsely, the abdomen sparsely and finely, punctate. Prosternum with the median sulcus abruptly terminating between the coxae, the basal process flat, broadly emarginate behind (fig. 17 *b*). Anterior femora with a blunt tooth, the others obsoletely serrulate. Anterior tibiae strongly sinuate within, the uncus stout. Length 4, breadth 2 millim.

Hab. GUATEMALA, Panajachel 5000 feet (*Champion*).

One male, found, in Dec. 1880, in the arid district bordering the Lake of Atitlan. Very like *P. oscillans*, differing from it in the much more distinctly punctate elytral striae, the smooth, flat scutellum, the emarginate basal process of the prosternum, the strongly sinuate anterior tibiae, and the less cylindrical rostrum (♂), the anterior femora with one small tooth only, and the others obsoletely serrulate.

20. *Pseudobaris biolleyi*, sp. n.

- ♂. Oblong-ovate, very shining, black; the third elytral interstice with a few narrow whitish scales at the base, the punctures on the under surface and legs each bearing a minute scale. Head closely punctate, transversely depressed between the eyes; rostrum arcuate, about as long as the head and prothorax, rather slender, finely punctate, the antennae inserted at the middle. Prothorax somewhat convex, much broader than long, strongly constricted in front, the sides rounded anteriorly; sparsely, finely punctate, except along the smooth median line. Elytra oblong-subtriangular, undulate; finely striate, the striae distinctly punctate at the base, the interstices broad, flat, narrowly costate at the apex, each with a row of scattered very minute punctures, the third with several additional impressions at the base. Beneath coarsely, the abdomen finely, punctate; fifth ventral segment shallowly foveate at the apex. Prosternal sulcus shallow, not margined. Legs rather long and slender; anterior femora with a distinct tooth, the others obsoletely dentate, the posterior pair shallowly sulcate in their outer half; anterior tibiae with a long apical uncus. Length $3\frac{1}{4}$, breadth $1\frac{3}{8}$ millim.

Hab. COSTA RICA, Guatuso near Cartago 1500 metres (*Biolley*).

One male. Not unlike *P. atitlana*, but with the prothorax shorter and more constricted in front, the rostrum more slender and subcylindrical, the elytra undulate and more deeply striate, the prosternal sulcus shallow, &c. The posterior femora have a shallow sulcus beneath, the others being excavate at the apex only.

21. *Pseudobaris dentipes*, sp. n. (Tab. XXI. figg. 18, 18 *a*, ♂.)

- Oblong, shining, black; the elytra with a dense oblong patch of narrow yellowish-white scales at the base, the rest of the upper surface almost bare, the punctures on the under surface and legs each bearing a small whitish scale. Head closely punctate, transversely depressed and foveate between the eyes; rostrum stout, arcuate, a little longer than the prothorax, densely, rugosely punctate, much smooth

and flattened at the tip in the ♀. Prothorax transverse, gradually narrowed forwards, strongly constricted in front, the sides slightly rounded anteriorly and at the extreme base; closely, coarsely punctate, except along the smooth median line. Elytra moderately long, gradually narrowing from the rounded humeri, depressed along the suture; with feebly punctured deep striae, the interstices flat, coarsely uniseriate-punctate, 2 and 3 closely, irregularly punctate, and 3 widened, at the base, 7-9 costate at the apex. Pygidium densely punctate, large and somewhat tumid in the ♂, flattened, vertical, and smaller in the ♀. Beneath somewhat densely punctate; first ventral segment slightly depressed down the middle in the ♂. Prosternal sulcus straight, rather shallow. Femora rather sharply dentate. Length $4\frac{2}{3}$ - $5\frac{3}{4}$, breadth $2\frac{1}{10}$ - $2\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca in Morelos (*H. H. Smith*; *Wickham*; *Deam*, *U.S. Nat. Mus.*).

A pair found by Mr. C. C. Deam, a female by Mr. Wickham, and a male by Mr. H. H. Smith. More elongate than *P. senescens*, the elytra depressed along the suture and almost bare (the basal spot excepted), the femora dentate. This last-mentioned character separates *P. dentipes* from *P. discreta* and its allies.

22. *Pseudobaris tibialis*. (Tab. XXI. figg. 19, 19 a, ♂.)

Baridius tibialis, Boh. in Schönh. Gen. Cur. iii. p. 726¹; viii. 1, p. 179².

♀. *Pseudobaris gigantea*, Solari, Ann. Mus. Genova, xlii. p. 433 (1906)³.

Hab. MEXICO^{1 3} (*Sturm*², in coll. *Sallé*; *Truqui*, in *Mus. Brit.*), Zapotlan, Tonila, Morelia (*Höge*), Acaguizotla in Guerrero (*H. H. Smith*), Cuernavaca (*Barrett*, in *U.S. Nat. Mus.*).

Apparently a common insect in Western Mexico, and recognizable amongst the allied forms by its large size, immaculate elytra, and feebly dentate femora. I have seen the types of Boheman and Solari, and also the specimen in the Sturm collection subsequently described in Schönherr's work². The original type of *B. tibialis*¹ has the prothorax a little more transverse and more coarsely punctured than usual, and the ferruginous colour of the tibiae in this insect is of course due to immaturity. The first ventral segment is slightly hollowed down the middle in the male. The elytral interstices are less distinctly costate at the apex than in *P. undulata* and its allies.

23. *Pseudobaris cribrella*.

Pseudobaris cribrella, Solari, Ann. Mus. Genova, xlii. p. 433 (1906)¹.

Hab. MEXICO, Atoyac, Teapa (*H. H. Smith*); GUATEMALA, Zapote, Dueñas (*Champion*); COSTA RICA¹, Escazu, Higuito (*Biolley*), Caché (*Rogers*).

A small, oblong-ovate, black form, with a coarsely punctured prothorax and a row of rather coarse transverse impressions along each elytral interstice (the third neither widened nor albo-squamose at the base), the prosternal sulcus straight and deep, the anterior femora with a short tooth, the rostrum elongated and smoother in the female than in the male. Sent in numbers from Higuito.

24. **Pseudobaris senescens.** (Tab. XXI. figg. 20, 20 a, ♀.)

Baridius senescens, Boh. in Schönh. Gen. Curc. viii. 1, p. 136¹.

Baridius brevis, Sturm, in litt.².

Hab. MEXICO¹ (*Sturm*, in coll. *Sallé*; *Mus. Brit.*), Guanajuato, Juquila (*Sallé*), Chilpancingo (*Höge*, *H. H. Smith*), Xucumanatlan (*H. H. Smith*), Cerro de Plumas (*Höge*); NICARAGUA, Momotombo (*ex Wickham*).

I have seen thirteen specimens of this species, including the type, all but one being from Mexico. It is an oblong, shining, black or æneous form, with numerous rather coarse, decumbent, whitish setæ on the elytra, in addition to the white spot at the base. The elytral interstices are less coarsely and more sparsely punctured than in *P. cribripennis*, the second and third relatively wider and with an irregular double series of impressions. The rostrum is very stout, arcuate, and about as long as the head and prothorax in both sexes. The prosternal sulcus is straight, shallow, and margined at the sides.

25. **Pseudobaris binotata**, sp. n. (Tab. XXI. figg. 21, 21 a, ♀.)

Oblong-ovate, convex, shining, black; the elytra with a dense oval patch of narrow white scales at the base of the third interstice and several widely scattered decumbent white setæ along the interstices 3, 5, 7, and 9; the punctures of the under surface and legs each bearing a small white hair-like scale. Head closely punctate, transversely depressed between the eyes; rostrum stout, arcuate, a little longer than the prothorax, closely punctate, smoother towards the apex in the ♀, the antennæ inserted at the middle. Prothorax transverse, rounded at the sides anteriorly, feebly constricted in front; coarsely, closely punctate. Elytra rather short, narrowly punctate-striate, the interstices broad, flat, subcostate at the apex, each with a closely-packed row of moderately coarse transverse punctures, 3 widened at the base. Beneath closely punctate. Prosternal sulcus deep, straight. Femora unarmed.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{10}$ – $1\frac{1}{2}$. (♂ ♀.)

Hab. GUATEMALA, Calabon in Vera Paz (*Champion*: ♂ ♀); PANAMA, Taboga I. (*Champion*: ♀)

Three specimens. Very like the smaller specimens of *P. cribripennis*, but more convex, the white patch at the base of the third interstice larger, the scattered setæ on the alternate interstices finer and less elongate. More convex than *P. cylindricollis*, the prothorax arcuately narrowing from near the base, the anterior femora unarmed.

26. **Pseudobaris cribripennis.**

Pseudobaris cribripennis, Solari, Ann. Mus. Genova, xlii. p. 435 (1906)¹.

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Milpas in Durango (*Forrer*), Sierra de Durango (*Höge*, in coll. *Solari*), Durango city, Tacambaro, Tehuantepec (*Höge*), Yentanas (*Forrer*, *Höge*), Gonzales (*Wickham*), Chilpancingo, Soledad (*H. H. Smith*); GUATEMALA, Santa Rosa, San Gerónimo, Dueñas (*Champion*), Yzabal (*Sallé*), Guatemala city (*Salvin*); NICARAGUA, Managua (*Solari*¹).

Sent us in numbers by the late C. F. Höge from Ventanas. This insect is nearly related to *P. luctuosa*, Casey, from Florida *; but it is a little less elongate, and has the elytra relatively shorter and more narrowed towards the apex, and the interstices are subcarinate on the apical declivity. The prothorax is very coarsely, closely punctate (except along the smooth median line, which is often wholly wanting in some specimens from the same localities), and the elytra have a row of coarse transverse punctures along each interstice, those on 2, 3, 5, 7, and 9 each bearing a rather long, decumbent, easily-abraded seta, 3 with a few white scales at the base. The rostrum of the male is rather coarsely punctate, that of the female being smoother and flatter at the tip. The tarsal claws can scarcely be described as connate at the base in the type kindly communicated by Signor Solari. The length varies from $2\frac{3}{4}$ - $4\frac{1}{4}$, and the breadth from $1\frac{1}{3}$ - $2\frac{1}{10}$ mm.

27. *Pseudobaris notata*. (Tab. XXI. figg. 22, 22 a, ♂.)

Baridius notatus, Boh. in Schönh. Gen. Curc. iii. p. 723¹.

♂. Prosternum in large, fully-developed examples more or less tumid in front of the anterior coxæ (the median sulcus thus becoming wider and shallower, or obsolete posteriorly), in some specimens flattened and with the median sulcus deep and parallel-sided; metasternum and first ventral segment broadly hollowed down the middle; pygidium tumid in the centre.

♀. Rostrum more sparsely punctate than in the ♂; pygidium flattened, sometimes carinate down the middle.

Hab. MEXICO¹ (*Truqui*, in *Mus. Brit.*), Ventanas in Durango (*Forrer*), Tonila in Colima, Cuernavaca (*Höge*), Parada in Oaxaca (*Sallé*).

A very elongate, shining, black form with a conspicuous albo-squamose spot on the basally widened portion of the third elytral interstice, of which I have seen numerous males (including the type) and seven females. The males vary in the development of the prosternum as above described, and in fresh specimens the femora (which are scarcely sulcate beneath) and tibiæ are more or less hairy. The females vary enormously in size, some of them (?=var. β of Boheman) being very small and subcylindrical. The specimens before me measure: length $4\frac{2}{3}$ - $8\frac{1}{4}$, breadth $1\frac{4}{5}$ - $3\frac{1}{2}$ mm.

28. *Pseudobaris undulata*. (Tab. XXI. figg. 23, 23 a, ♀.)

Baridius undulatus, Say, Deser. N.-Am. Curc. p. 17 (1831)¹; Complete Writings, i. p. 281² [nec

B. undatus (Say), Boh. in Schönh. Gen. Curc. iii. p. 683].

Baridius crenatus, Boh. in Schönh. Gen. Curc. iii. p. 681³.

Baridius depilis, Boh. loc. cit. p. 682⁴.

Pseudobaris costaricensis, Solari, Ann. Mus. Genova, xlii. p. 436 (1906)⁵.

* The N.-American *Baridius anthracinus*, Boh. (the type, ♂, of which I have seen), is not synonymous with *P. luctuosa* as Casey supposed, but = *Autobaris ibis*, Lec., a specimen of which from Florida is before me. It has a long second joint to the funiculus.

Hab. MEXICO ¹⁻⁴, Colima, Guanajuato, Guerrero, Michoacan, Morelos, Vera Cruz, Oaxaca, Tabasco, Yucatan; BRITISH HONDURAS; GUATEMALA; NICARAGUA; COSTA RICA ⁵; PANAMA to Tabernilla, Canal zone.

It is not necessary to enumerate the exact localities for this insect, the commonest Barid in our region, ranging from the Mexican States of Colima and Vera Cruz to the Panama isthmus, and probably extending into the northern part of South America. I have examined hundreds of specimens and am unable to distinguish more than one variable species, the black and the brassy forms of which are mentioned by Say. The types of *B. crenatus* and *B. depilis*, Boh., and of *P. costaricensis*, Solari (a ♀ of the æneous variety), have all been examined by me, and there can be no doubt that they are synonymous with *B. undulatus*, Say, the present insect being the only Mexican *Pseudobaris* applying satisfactorily to his brief description. The "type" of *B. subscabrosus*, Boh., from the Chevrolat collection, communicated by Dr. Sjöstedt, also equals *B. undulatus*, but as this example does not accord with Boheman's diagnosis, there has perhaps been some mistake in labelling*. *B. undatus*, Boh., I am unable to identify. The present species may be known by its oblong-ovate form, the very shining black or somewhat brassy surface, the uneven elytra, with the interstices sharply costate on the apical declivity, the deep, parallel-sided prosternal sulcus, the stout, strongly arcuate rostrum (which is barely as long as the head and prothorax, and is a little smoother and more slender in the female than in the male), the sulcate, unarmed femora, &c. The puncturing of the prothorax is coarse (except along the smooth median line), the transverse depressions of the elytra are sometimes shallow, and the white spot at the base of the third interstice varies in size, the scales being often abraded. *B. depilis* has the sides of the prothorax more oblique than in *B. undulatus*, but no value can be attached to this character. In one of the two specimens from Trece Aguas (a small, narrow, immature ♂, perhaps not really belonging here) the femora are distinctly toothed. Some of Biolley's Costa Rican examples are labelled as having been found on "Labiatae."

29. ***Pseudobaris apicalis*.** (Tab. XXI. figg. 24, 24 a, ♀.)

♂. *Baridius apicalis*, Boh. in Schönh. Gen. Curc. iii. p. 724¹.

♀ *Baridius subscabrosus*, Boh. loc. cit. p. 683².

♂. Rostrum alutaceous and finely punctate, flattened at the apex, the antennæ inserted at about the middle.

♀. Rostrum longer and smoother, flattened from near the base, becoming much thinner towards the tip, the antennæ inserted behind the middle.

Hab. MEXICO ^{1 2} (*coll. Solari*); GUATEMALA, Dueñas, San Gerónimo (*Champion*).

I have seen twelve specimens of this species, including the type. It is narrower and relatively more elongate than *P. undulata*, the puncturing of the prothorax is denser

* *B. subscabrosus* is here treated as probably synonymous with *P. apicalis*.

and not so coarse, the elytra are less rounded at the sides anteriorly, and the rostrum is dissimilarly formed in the two sexes. The elytral interstices are sharply costate on the apical declivity, and the third is widened and albo-maculate at the base. The prosternal sulcus is straight, deep, and sharply margined.

P. subcaudata superficially resembles *P. apicalis*, but it belongs to the *P. acutipennis*-section of the genus.

30. *Pseudobaris discreta*.

Pseudobaris discreta, Casey, Ann. N. York Acad. Sci. vi. pp. 552, 554¹.

Hab. NORTH AMERICA, Texas¹, Brownsville.—MEXICO (*Truqui*, in *Mus. Brit.*).

A *Pseudobaris* (♂) found by Truqui in Mexico seems to belong to *P. discreta*, Casey (described from a single example), of which a specimen from Brownsville has been sent us by Mr. Barber. It is more shining than *P. cribripennis*, Solari, and has the elytra less widened anteriorly and the interstices less rugose. The rostrum is described as slender, but this definition does not apply to either of the insects before me. The third elytral interstice is widened and albo-squamose at the base in both species.

31. *Pseudobaris guttifer*, sp. n.

Oblong-ovate, shining, black; the third elytral interstice with a small patch of narrow white scales at the base, the punctures on the under surface and legs each bearing a minute scale. Head finely punctate, transversely depressed between the eyes; rostrum arcuate, stout, about as long as the head and prothorax, closely punctate, in the ♀ flattened and much smoother in its apical half, the antennæ inserted at about the middle. Prothorax transverse, constricted in front, arcuately narrowing from the base; closely, rather finely, punctate, except along the smooth median line. Elytra rounded-triangular, narrowly punctate-striate, the interstices broad, flat, narrowly costate at the apex, each with an irregular row of very fine punctures, which become transverse towards the sides, the third widened and more closely punctate at the base. Beneath closely and coarsely, the abdomen finely, punctate; first ventral segment slightly depressed along the middle, and the fifth feebly foveate at the apex, in the ♂. Prosternal sulcus shallow, not margined. Femora unarmed.

Length $3\frac{1}{2}$ – $3\frac{3}{4}$, breadth $1\frac{1}{2}$ – $1\frac{5}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Atoyac in Vera Cruz (*H. H. Smith*).

One female and two males. Of the same size and shape as *P. stigmatica*, but with the rostrum (♀) much shorter and stouter, the prothorax not so coarsely punctate, the elytra rounded at the apex, with finer striæ and much smoother interstices, the prosternal sulcus shallow and not margined, the anterior femora unarmed. The much finer sculpture and the less sharply defined prosternal sulcus distinguish *P. guttifer* from *P. discreta* and *P. cribripennis*.

32. *Pseudobaris ocellata*.

Pseudobaris ocellata, Solari, Ann. Mus. Genova, xlii. p. 434 (1906)¹.

Hab. MEXICO, Toxpan (*Sallé*), Jalapa, Cordova (*Höge*), Millan in Vera Cruz (*Knab*, BIOL. CENTR.-AMER., Coleopt., Vol. IV. Pt. 5, February 1909.

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in *U.S. Nat. Mus.*), Motzorongo (*Osborn, in U.S. Nat. Mus.*), Atoyac, Teapa (*H. H. Smith*); COSTA RICA¹, Zent (*Knab, in U.S. Nat. Mus.*).

A small, oblong-ovate, shining, æneous form, with a very coarsely punctured prothorax, a small albo-squamose spot at the base of the third elytral interstice, a straight, deep prosternal sulcus, &c. The rostrum of the female is flattened and smoother in its apical half. The sculpture of the prothorax is variable, the punctures on the disc being large and rounded in the type (which I have seen) and smaller in some of the Mexican examples.

33. *Pseudobaris lucens*, sp. n. (Tab. XXI. figg. 25, 25 a, ♂.)

A brilliant æneous form very like *P. lucida* (infra, p. 448), and differing as follows:—General shape oblong-ovate, due to the prothorax being rounded at the sides, the prothorax also more sparsely and not so coarsely punctured; the elytra not depressed along the suture, the striae more finely punctate and almost straight to the apex, the interstices more feebly costate on the apical declivity and with the seriate punctures very minute; the pygidium of the ♀ declivous and with the narrowly exposed portion separated from the rest by an incomplete transverse ridge, the prosternal sulcus shallow and feebly margined.

Length $3\frac{2}{5}$ – $3\frac{7}{8}$, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO (*coll. Fry, in Mus. Brit.*).

One pair, so like the southern *P. lucida* that they were at first supposed to be a Mexican form of that species. The difference in the structure of the pygidium of the female is somewhat remarkable, there being no trace of a transverse ridge in the corresponding sex of *P. lucida*. The scales are wanting at the base of the third elytral interstice, but they are probably abraded; the female has, on the left elytron, an adventitious tubercle near the middle of this same interstice.

34. *Pseudobaris parallelipennis*.

Pseudobaris parallelipennis, Solari, Ann. Mus. Genova, xlii. p. 434 (1906)¹.

Hab. MEXICO, "Sierra de Durango"¹ (*Höge, in coll. Solari*).

This is a form of *P. apicalis* with the prothorax very coarsely punctate, and the elytral striae broad and strongly crenato-punctate, the interstices transversely wrinkled, the third neither widened nor maculate at the base. I have seen one of the types, a female, which has the rostrum rather broad, alutaceous, and strongly flattened, and the antennae inserted at about the basal third, as in the same sex of *P. apicalis*. The prosternal sulcus is straight and deep. The Durango habitat requires confirmation.

35. *Pseudobaris subparallela*, sp. n.

Oblong, narrow, shining, black, glabrous above, the punctures on the under surface and legs each bearing a minute, white, hair-like scale. Head finely punctate, transversely depressed between the eyes; rostrum (♂) arcuate, moderately stout, about as long as the head and prothorax, very finely, sparsely punctate, (♀) a little longer, smoother, and flattened from near the base, the antennae inserted at about the basal third (♂) or fourth (♀). Prothorax transverse, somewhat convex, constricted and much narrowed in front, the sides strongly rounded anteriorly and parallel behind; closely, coarsely punctate, except along

the smooth median line. Elytra oblong, with narrow, feebly punctured striæ, the interstices broad, obsoletely uniscriate-punctate, flat, narrowly costate on the apical declivity, 9 raised from about the middle onwards. Pygidium densely punctate, small in the ♀, larger in the ♂. Beneath very coarsely and closely, the ventral segments sparsely and finely, punctate, 1 slightly depressed down the middle in the ♂. Prosternal sulcus rather shallow. Femora without trace of tooth.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. COSTA RICA (coll. Fry, in Mus. Brit.), Escazu 1200 metres (Biolley).

Three males and one female. This is the Costa Rican representative of the Mexican *P. parallelipennis*, differing from it in the much more finely striate elytra, the narrower, shining, and less flattened rostrum of the female, &c. The more coarsely punctured prothorax and the immaculate elytra separate *P. subparallela* from *P. apicalis*.

36. *Pseudobaris rugipennis*, sp. n.

Oblong, opaque above, shining beneath, black; glabrous above, the punctures of the under surface and legs each bearing a minute whitish scale. Head finely punctate, transversely depressed between the eyes; rostrum arcuate, moderately stout, a little longer than the prothorax, slightly flattened towards the tip, finely punctate, the antennæ inserted just behind the middle. Prothorax transverse, rounded at the sides anteriorly, constricted in front; coarsely, densely punctate. Elytra oblong, very gradually narrowing from the base, slightly compressed at the sides below the humeri; with feebly punctured, narrow, deep striæ, the interstices flat, narrowly costate at the apex, each with a closely-packed row of coarse transverse impressions, 3 not widened at the base. Beneath closely and coarsely, the ventral segments 2-5 sparsely and finely, punctate. Prosternal sulcus deep, straight. Femora unarmed.

Length $3\frac{1}{2}$, breadth $1\frac{2}{3}$ millim. (♀?)

Hab. MEXICO, Juquila in Oaxaca (Sallé).

One specimen, perhaps somewhat abraded. An oblong, rugosely punctate, immaculate form, less elongate than *P. parallelipennis* and *P. subparallela*, and with the elytra less widened anteriorly than in *P. cribripennis* and its allies.

37. *Pseudobaris glabripennis*, sp. n.

Oblong-ovate, shining, black with a brassy lustre; glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum (♂) bowed from the base, nearly as long as the head and prothorax, moderately stout, closely punctate, flattened and smoother at the tip, (♀) a little longer and abruptly flattened and almost smooth from near the base, the antennæ inserted slightly behind the middle in the ♂ and at about the basal third in the ♀. Prothorax transverse, rounded at the sides anteriorly, feebly constricted in front, the sides subparallel at the base; closely, somewhat coarsely punctate, sometimes with an abbreviated smooth median line. Elytra a little wider than the prothorax, very gradually narrowing from the rounded humeri, slightly depressed along the suture; sharply striate, the striæ with scattered punctures which become coarse towards the base, the interstices broad, flat, narrowly costate on the apical declivity, each with a scattered row of very minute punctures. Pygidium large and convex in the ♂, smaller and transverse in the ♀. Beneath coarsely, the abdomen sparsely and finely, punctate; fifth ventral segment sinuato-truncate at the apex, and the first flattened down the middle, in the ♂. Prosternal sulcus straight, deep. Femora unarmed.

Length $3\frac{1}{10}$ - $3\frac{1}{2}$, breadth $1\frac{1}{4}$ - $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Guatemala city, Capetillo, Dueñas (Champion).

Six specimens, three of each sex. Smaller and less elongate than the Costa Rican

P. subparallela, the prothorax not so convex, less rounded at the sides, and feebly constricted in front, the elytra more finely striate. Larger than *P. minuscula*, the elytra more gradually narrowed from the base and rounded at the tip, the rostrum of the female abruptly flattened.

38. *Pseudobaris mutabilis*, sp. n.

Oblong-ovate, flattened above, very shining, æneous; glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely depressed between the eyes; rostrum (♂) arcuate, as long as the head and prothorax, moderately stout and closely punctate at the base, becoming more slender, flattened, and much smoother towards the tip, (♀) a little longer, and flattened and slender from near the base, the antennæ inserted behind the middle in both sexes. Prothorax transverse, gradually narrowing anteriorly, feebly constricted in front; sparsely, finely punctate, except along the narrow, smooth, median space. Elytra a little wider than the prothorax, unarmed at the apex; with faintly punctured, fine striæ, the interstices almost smooth, broad, and feebly costate on the apical declivity, the third not widened at the base. Pygidium large in the ♂, small and transverse in the ♀. Beneath sparsely, the abdomen very finely, punctate. Prosternum with a straight deep sulcus. Legs slender; femora unarmed.

Var. Black or bluish-black.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{10}$ – $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Teapa (*H. H. Smith*); GUATEMALA, Trece Aguas (*Schwarz and Barber*, in *U.S. Nat. Mus.*); COSTA RICA, Irazu (*Rogers*); PANAMA, Volcan de Chiriqui (*Champion*).

This is a form of *P. acutipennis* with the apices of the elytra unarmed and the third interstice glabrous at the base. It varies in colour in the same way, the Teapa and Costa Rican examples corresponding to *P. callosipennis*. Fourteen specimens have been seen, five of which are from Teapa.

39. *Pseudobaris perexigua*, sp. n.

Oblong, narrow, rather convex, somewhat shining, black; almost glabrous and finely alutaceous above, the punctures on the under surface and legs each bearing a minute scale. Head convex, densely punctate, transversely grooved between the eyes; rostrum moderately stout, about as long as the prothorax, abruptly and somewhat obliquely bowed from the base, densely punctate, the apical half much smoother; antennal club rather stout. Prothorax transverse, constricted in front, the sides rounded anteriorly and parallel behind; densely punctate. Scutellum very small, rounded. Elytra a little wider than the prothorax, subparallel in their basal half; narrowly punctate-striate, the interstices closely and very finely uniseriate-punctate, almost flat on the disc, subcostate at the apex, the ninth becoming cariniform posteriorly. Pygidium large. Prosternal sulcus deep. Beneath closely, the ventral segments 1–4 very sparsely and finely, punctate. Legs short; femora rugosely punctate, unarmed; tarsal claws long.

Length 2, breadth $\frac{4}{5}$ millim.

Hab. GUATEMALA, Cerro Zunil 4000 feet, Pacific slope (*Champion*).

One specimen, probably a male. A minute, narrow, oblong form not unlike *P. scabrida*, less rugose above, the apices of the elytra unarmed, the rostrum not so stout and somewhat oblique, the prosternal groove deeper.

Plesiobaris amula, Casey, from Florida, is of about the same size and shape as the present species, except that it has the elytra more narrowed posteriorly.

40. *Pseudobaris stigmatica*. (Tab. XXI. fig. 26, ♀.)

Pseudobaris stigmatica, Solari, Ann. Mus. Genova, xlii. p. 432 (1906) ¹.

Hab. MEXICO, "Sierra de Durango" ¹ (*Höge, in coll. Solari*).

This species, a co-type (♀) of which has been examined, forms a sort of connecting-link between the *P. undulata*- and *P. acutipennis*-groups. It is separable from all the varieties of *P. undulata* by the short but distinct apical prominences of the elytra and the elongate, comparatively slender rostrum (fig. 26). The anterior femora are finely denticulate and the anterior tibiæ strongly sinuate within. The prosternal sulcus is margined at the sides and moderately deep.

41. *Pseudobaris acutipennis*. (Tab. XXI. figg. 27, 27 a, b, ♀.)

Baridius acutipennis, Say, Descr. Curc. N. Am. p. 27 (1831) ¹; Complete Writings, i. p. 295 ²;

Boh. in Schönh. Gen. Curc. iii. p. 670 ³.

Pseudobaris acutipennis, Casey, Ann. N. York Acad. Sci. vi. p. 553 ⁴.

Hab. MEXICO ¹⁻⁴ (*Truqui, in Mus. Brit.*), Toxpam, Yolos, Parada, Jacale (*Sallé*), Jalapa, Zacualtipan (*Höge*), Atoyac (*H. H. Smith*), Orizaba (*H. H. Smith; Osborn, in U.S. Nat. Mus.*), Cordova, Nogales (*Knab, in U.S. Nat. Mus.*), Tehuantepec (*Mus. Brit.*); GUATEMALA, Trece Aguas (*Schwarz and Barber, in U.S. Nat. Mus.*), San Gerónimo, Dueñas, Calderas (*Champion*); PANAMA, Volcan de Chiriqui (*Champion*).

Var. Nigro-cæruleous or black.

Pseudobaris callosipennis, Solari, Ann. Mus. Genova, xlii. p. 431 (1906) ⁵.

Hab. MEXICO (*coll. Solari*), Omilteme in Guerrero (*H. H. Smith*), Toxpam (*Sallé*); GUATEMALA, Chiacam, Purula, and San Gerónimo (*Champion*); COSTA RICA ⁵ (*Biolley*); PANAMA, Volcan de Chiriqui (*Champion*).

A common insect in Central America, and mainly recognizable by its small size, the dentate apices of the elytra, the interstices of the latter costate at the apex and the third with a small patch of whitish scales at the base, and the slender legs. The typical form is æneous in colour and it is found in many of the same localities as the dark variety, the latter being rare in Mexico and common in the more southern countries. Specimens also occur with the surface of the prothorax dull and alutaceous. The females have a much longer, smoother, and more slender rostrum than the males. The males have the first ventral segment slightly flattened in the middle and the fifth truncate at the apex, leaving the pygidium partly visible from beneath. The prosternal sulcus is deep and sharply margined. The types (♂ ♀) of *P. callosipennis*, kindly communicated by Signor Solari, are black, like the other examples we have received from Costa Rica. About 100 specimens have been examined in all.

42. **Pseudobaris plicata.** (Tab. XXI. figg. 28, 28 a, ♂.)

♂. *Baridius plicatus*, Boh. in Schönh. Gen. Curc. viii. 1, p. 180¹.

Hab. MEXICO¹, Omilteme in Guerrero (*H. H. Smith*), Toxpam, Oaxaca (*Sallé*); GUATEMALA, Quiché Mts. (*Champion*).

The type of this insect, a somewhat immature male, æneous in colour, kindly communicated by Dr. Sjöstedt, is more elongate than *P. acutipennis*, and has the prothorax straight at the sides and abruptly constricted in front, the elytra subparallel at the base and undulate on the disc, and the first ventral segment sulcate down the middle. Various specimens from Omilteme, Toxpam, Oaxaca, and Quiché are provisionally referred to it; these examples, however, have the prothorax less abruptly constricted in front and the first ventral segment simply flattened down the middle in the male.

43. **Pseudobaris subcaudata**, sp. n.

Oblong-ovate, shining, black with a faint brassy lustre; the third elytral interstice with a small oblong patch of narrow whitish scales at the base; the punctures of the under surface and legs each bearing a minute, hair-like, white scale. Head finely punctate, transversely depressed between the eyes; rostrum (♂) arcuate, stout, a little longer than the head and prothorax, closely, finely punctate, (♀) much longer, smoother, and comparatively slender, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax transverse, gradually narrowing from the base, constricted in front; rather sparsely punctate, smooth along the median line. Elytra moderately long, very gradually narrowing from the rounded humeri, undulate on the disc, and each with an angular prominence at the apex; sharply striate, the interstices broad, flat, sharply costate at the apex, obsoletely uniseriate-punctate, 3 widened at the base. Beneath closely and coarsely, the abdomen sparsely and finely, punctate; first ventral segment flattened down the middle in the ♂. Prosternal sulcus deep, straight, and sharply margined. Legs rather slender; femora unarmed.

Length $3\frac{1}{2}$ –4, breadth $1\frac{1}{2}$ – $1\frac{4}{5}$ millim. (♂ ♀.)

Hab. GUATEMALA, Dueñas, San Gerónimo (*Champion*); PANAMA, Volcan de Chiriqui 4000 feet (*Champion*).

Nine specimens, all but one from Guatemala; these latter are taken as the types. This insect has exactly the facies of *P. apicalis* (Boh.), and occurs with it in the two Guatemalan localities, but is easily separable therefrom by the dentate apices of the elytra, the more slender legs, and the slender, narrower, and less flattened rostrum of the female. The single example from Panama has the apical prominences feebly developed. *P. subcaudata* is more elongate than *P. acutipennis* and *P. callosipennis*, approaching *P. plicata* in this respect.

44. **Pseudobaris gibbicollis**, sp. n. (Tab. XXI. fig. 29, ♂.)

Oblong-ovate, very shining, nigro-æneous; the third elytral interstice with a short streak of narrow whitish scales at the base, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely depressed between the eyes; rostrum arcuate, about as long as the head and prothorax, stout, sparsely, very finely punctate, in the ♀ a little longer, smoother, and more slender, the antennæ inserted at (♂) or slightly behind (♀) the middle, the club large and with conspicuous sutures. Prothorax much broader than long, arcuately narrowing from the base and

strongly constricted in front, transversely depressed on the disc behind; very sparsely, minutely punctate, except along the abbreviated, smooth, narrow median space. Elytra much wider than the prothorax, undulate on the disc, each armed at the apex with an acute dentiform prominence; with faintly punctured fine striæ, the interstices broad, flat, narrowly costate on the apical declivity, each with a row of excessively minute scattered punctures. Beneath very sparsely, finely punctate. Prosternum with a sharply-defined sulcus ending abruptly between the coxæ, the basal process flattened and almost smooth. Legs slender; femora unarmed.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{3}{5}$ millim. (σ ♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Zacualtipan in Hidalgo (*Höge*).

Four specimens. A species nearly related to *P. acutipennis*, but with the upper and under surfaces much smoother, the prothorax transversely depressed at the base (so as to appear gibbous in front when viewed in profile), the antennal club larger.

45. *Pseudobaris subrugosa*, sp. n.

Oblong-ovate, subopaque, black, beneath shining and with a faint æneous lustre; the punctures on the under surface and legs each bearing a minute scale. Head closely punctate, transversely depressed between the eyes; rostrum strongly arcuate, stout, about as long as the head and prothorax, closely punctate, in the ♀ smoother and more slender, the antennæ inserted at (σ) or slightly behind (♀) the middle. Prothorax transverse, arcuately narrowing from the base, constricted in front; closely, rather coarsely punctate, except along the median line, the interspaces finely alutaceous. Elytra much wider than the prothorax, oblong, depressed along the suture, the humeri not prominent, the apices each armed with a triangular tooth; with sharply-cut, feebly punctured striæ, the interstices broad, flat, narrowly costate on the apical declivity, strongly, transversely strigose. Beneath coarsely, the abdomen sparsely and finely, punctate. Prosternal sulcus deep, straight. Legs rather slender; femora unarmed.

Length 3 – $3\frac{1}{10}$, breadth $1\frac{2}{5}$ millim. (σ ♀.)

Hab. Mexico (*Truqui*, in *Mus. Brit.*), Amula in Guerrero (*H. H. Smith*).

Two specimens. *P. subrugosa* may be described as a form of *P. callosipennis* with strongly, transversely strigose elytral interstices, and broader and deeper striæ, the third interstice neither widened nor squamose at the base, and the prothorax more coarsely punctured. *P. rugipennis* has somewhat similarly sculptured elytra, but in that insect the prothorax is broader and very coarsely sculptured, and the elytra are unarmed at the apex.

46. *Pseudobaris minuscula*, sp. n.

Oblong-ovate, moderately shining, black with a brassy lustre, the punctures on the under surface and legs each bearing a minute scale. Head minutely punctate, transversely grooved between the eyes; rostrum (σ) arcuate, stout, about as long as the head and prothorax, finely punctate, (♀) a little longer and smoother, the antennæ inserted near the middle in the σ and arising from nearer the base in the ♀. Prothorax coarsely, closely punctate. Elytra sharply striate, the striæ becoming deeper and more coarsely punctate anteriorly, the interstices flat, narrowly costate at the apex, each with a single row of fine, shallow, transverse punctures, the apices (as seen in profile) usually very feebly and obtusely produced. Beneath coarsely, the abdomen finely, punctate. Prosternal sulcus deep, straight, sharply margined, open behind. Femora unarmed.

Length $2\frac{1}{8}$ – $3\frac{1}{10}$, breadth 1 – $1\frac{2}{5}$ millim. (σ ♀.)

Hab. MEXICO (*coll. Solari*; *Mus. Brit.*), Toxpam (*Sallé*), Jalapa (*Höge*), Mexico city, Atoyac (*H. H. Smith*), Cordova (*Knab*, in *U.S. Nat. Mus.*), San Rafael Jicaltepec

(*Townsend, in U.S. Nat. Mus.*), Temax in N. Yucatan (*Gaumer*); NICARAGUA, Managua (*Solari*).

Numerous examples. Smoother than *P. cribrella*, the surface with an æneous lustre, the elytra with a series of very fine shallow punctures down each interstice, the apices (in the form selected as typical) very feebly and obtusely produced, the anterior femora unarmed.

47. *Pseudobarius scabrida*, sp. n.

Oblong-ovate, subopaque, black, the elytra and abdomen with a faint æneous lustre; glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head densely punctate, transversely grooved between the eyes; rostrum strongly arcuate, very stout, nearly as long as the head and prothorax, densely punctate, smoother at the tip in the ♀. Prothorax transverse, feebly constricted in front, the sides rounded anteriorly and parallel behind; coarsely, densely, confluent punctate. Elytra oblong, a little wider than the prothorax, very gradually narrowing from the base; deeply punctato-striate, the punctures becoming coarser towards the base, the interstices rather narrow, densely, transversely rugose, flat on the disc, convex at the apex, the ninth cariniform, almost parallel with the apical margin, and somewhat obtusely dentate at its point of termination near the suture. Beneath coarsely and densely, the shining ventral segments more finely and sparsely, punctate. Prosternal sulcus shallow. Legs short; femora and tibiae rugose, the femora unarmed.

Length $2\frac{1}{5}$ – $2\frac{9}{10}$, breadth 1 – $1\frac{1}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca (*Höge*); GUATEMALA, San Gerónimo (*Champion*).

Three specimens. A small, oblong, very rugose form, with a strongly arcuate, stout rostrum, densely asperate elytral interstices, the ridge on the ninth terminating in a small prominence, short legs, and a shallow prosternal groove. The surface-sculpture is very like that of *P. rugipennis* (except that the elytral interstices are narrower), and the apices of the elytra are formed much as in *P. acutipennis*.

48. *Pseudobaris lucida*, sp. n. (Tab. XXI. figg. 30, 30 a, b, ♂; 31, ♀.)

Somewhat fusiform, flattened above, very shining, æneous or cupreo-æneous; the third elytral interstice with a small patch of whitish scales at the base, the punctures on the under surface and legs each bearing a small scale. Head closely punctate, transversely depressed between the eyes; rostrum (♂) about as long as the head and prothorax, arcuate, moderately stout, closely punctate at the base, becoming more slender, flattened, and smoother towards the tip, (♀) a little longer and abruptly flattened and smoother from near the base, the antennæ inserted slightly behind the middle in the ♂ and at the basal third in the ♀. Prothorax broader than long, conical, feebly constricted in front; closely, rather coarsely punctate, except along the smooth median line. Elytra very gradually narrowing from the oblique humeri, which are almost in a line with the sides of the prothorax, more or less undulate on the disc and depressed along the suture, the apices separately rounded; punctate-striate—the striae sinuous towards the apex and the punctures becoming coarse and conspicuous towards the base,—the interstices broad, flat, narrowly and sinuously costate posteriorly, each with a scattered row of minute punctures. Pygidium large and convex in the ♂, subhorizontal and almost hidden in repose in the ♀. Beneath coarsely, the abdomen finely, punctate; fifth ventral segment truncato-emarginate at the apex (and the pygidium partly exposed ventrally) in the ♂, longer and ascending to the tip in the ♀. Prosternal sulcus straight, shallow, incompletely margined. Legs rather slender; femora unarmed.

Length 3 – $3\frac{3}{5}$, breadth $1\frac{1}{4}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. COSTA RICA (*coll. Solari*), San José (*Biolley*); PANAMA, Boquete, Volcan de Chiriqui 3500–4000 feet (*Champion*).

Eleven males and two females. A remarkably distinct form, superficially resembling *P. acutipennis* and *P. plicata*, of a brilliant metallic-æneous colour, with a conical prothorax, a shallow prosternal sulcus, unarmed elytra, with the striæ coarsely punctured anteriorly and the interstices sinuously costate at the tip, and the pygidium of the female almost covered by the elytra, the rostrum in this sex being abruptly flattened, so as to appear gibbous at the base, much as in *P. abrupta* and *P. puncticollis*. The San José specimens were found on *Polygonum punctatum* by the late P. Biolley.

49. ***Pseudobaris dividua***, sp. n. (Tab. XXI. figg. 32, 32 *a*, *b*, ♀.)

Oblong-ovate, rather dull, black, with a brassy lustre, glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head minutely punctate, alutaceous; rostrum (♂) arcuate, stout, about as long as the head and prothorax, finely strigoso-punctate, (♀) smoother, longer, and more slender, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax transverse, arcuately narrowing from the base, feebly constricted in front; coarsely, closely punctate. Elytra depressed along the suture, deeply punctate-striate, the interstices subcostate on the apical declivity, each with a row of fine, shallow, transverse impressions. Beneath closely punctate. Prosternum (fig. 32 *b*) deeply sulcate, the sulcus not or feebly margined at the sides anteriorly and becoming divided into two between the coxæ by a smooth, lanciform, anterior prolongation of the basal process, the latter feebly emarginate behind. Femora unarmed.

Length $2\frac{1}{8}$ – $3\frac{1}{2}$, breadth 1 – $1\frac{3}{8}$ millim. (♂ ♀.)

Hab. MEXICO, Motzorongo (*Flohr*), Atoyac, Teapa (*H. H. Smith*); GUATEMALA, Trece Aguas in Alta Vera Paz (*Schwarz & Barber*, in *U.S. Nat. Mus.*), Tamahu, Senahu, Dueñas (*Champion*); NICARAGUA (*Sallé*), Chontales (*Janson*); COSTA RICA, Patarra (*Biolley*).

Found in plenty at Trece Aguas and Tamahu. Extremely like *P. diversa*, but with the elytra simply rounded at the apex, and the prosternal sulcus less strongly bifurcate behind (the dentiform piece extending forward from the basal process in consequence narrower) and not sharply margined at the sides anteriorly. *P. puncticollis* (Boh.) has a somewhat similar, bifurcate prosternal excavation, but in that insect the basal process is also sulcate, and Λ -shaped or lanciform between the coxæ, the elytra are more broadly striate, the rostrum is gibbous at the base, &c. *Heterosternus carbo*, Kirsch, from Colombia, also has a similar sternal structure, but it is a smoother and more elongate insect than *P. dividua*.

50. ***Pseudobaris abrupta***, sp. n. (Tab. XXI. figg. 33, 33 *a*, *b*, ♀.)

Oblong-ovate, moderately shining, black, with a brassy lustre; glabrous above, the punctures of the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate; rostrum (♂) about as long as the head and prothorax, abruptly bent inwards from near the base and rather slender thence to the tip, and closely, finely punctate, (♀) more slender, flattened, and much smoother, the antennæ inserted at about the basal third in both sexes. Prothorax slightly broader than long, rather convex, gradually narrowing from the base, and feebly constricted in front; closely impressed with very coarse, rounded punctures. Elytra rounded-triangular, very little wider than the prothorax, depressed along the suture; deeply striate, the striæ becoming coarsely punctate anteriorly, the interstices flat, rather

narrow on the disc, feebly costate at the apex, each with a row of scattered moderately coarse punctures. Beneath very coarsely, the abdomen and middle of the metasternum sparsely and finely, punctate; first ventral segment slightly hollowed down the centre in the ♂. Prosternum (fig. 33 b) very deeply sulcate to near the coxæ and hollowed thence to the base, the sulcus smooth and sharply margined, the basal process emarginate behind and extending angularly forwards for a short distance in front. Femora unarmed. Length $2\frac{1}{2}$ – $2\frac{3}{4}$, breadth $1\frac{1}{10}$ – $1\frac{1}{8}$ millim. (♂ ♀.)

Hab. NICARAGUA, Managua (*Solari*).

Seven specimens. Extremely like *P. puncticollis* (Boh.*), the type of which I have seen, but with the basal portion of the prosternum formed very much as in *P. diversa* (e. g. with a short, angular projection between the coxæ in front), the elytra not so broadly striate, &c. The rounded apices of the elytra and the gibbous rostrum distinguish *P. abrupta* from *P. diversa*, and the structure of the prosternum, rostrum, &c., separates it from *P. dividua*.

51. *Pseudobaris diversa*, sp. n.

Oblong-ovate, dull, black, with a brassy lustre, glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head minutely punctate, alutaceous, transversely depressed between the eyes; rostrum (♂) arcuate, stout, about as long as the head and prothorax, shining, closely strigosopunctate, (♀) smoother, longer, and more slender, the antennæ inserted at (♂) or behind (♀) the middle. Prothorax transverse, gradually and arcuately narrowing from the base, feebly constricted in front; closely, coarsely punctate, except along the median line, the interspaces alutaceous. Elytra gradually narrowing from the rounded humeri, depressed along the suture, each with a short angular prominence at the apex; deeply punctate-striate, the interstices subcostate on the apical declivity, each with a series of shallow transverse impressions. Beneath coarsely, the abdomen finely, punctate; first ventral segment slightly depressed down the middle. Prosternum deeply sulcate from the apex to between the anterior coxæ, the sulcus sharply margined at the sides anteriorly and strongly bifurcate posteriorly, the basal process depressed along the middle, angularly extended forwards, and emarginate behind. Femora unarmed.

Length $2\frac{1}{2}$ – $3\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Guatemala city (*Salvin, Champion*), Zapote, Capetillo, Dueñas (*Champion*); COSTA RICA, Escazu (*Biolley*); PANAMA, Volcan de Chiriqui (*Champion*).

Found in numbers in Guatemala. This insect superficially resembles *P. cribrella*, but it has the apices of the elytra angularly produced as in *P. callosipennis*, differing from both of them in the strongly bifurcate prosternal sulcus and the dull alutaceous surface of the prothorax. *P. subanea* (Kirsch), from Peru, is an allied form with the prosternal sulcus less furcate behind, the rostrum shorter, the prothorax finely punctured, &c.

CERCOBARIS, gen. nov.

Mandibles short, decussate; rostrum strongly and abruptly curved from the base, very stout and compressed, not longer than the head and prothorax, the antennæ inserted just behind the middle, the antennal club densely pubescent, oblong-ovate, and about as long as joints 2–7 of the funiculus; prothorax feebly constricted in front; scutellum free, rounded or oblong; elytra oblong or subtriangular, a little wider

* *Baris sulcipennis*, Bris., is not synonymous with this species as stated by v. Heyden (Deutsche ent. Zeitschr. 1882, p. 156), but is a true *Baris*, sensu Casey: cf. *infra*, p. 460.

than the prothorax, the apices angularly, horizontally produced; pygidium exposed, transverse, vertical; prosternum shallowly (*C. fortirostris* and *C. parva*) or deeply (*C. brevicauda*) sulcate, the basal process short and depressed (longitudinally ridged behind each coxa in *C. brevicauda*); anterior coxæ separated by not more than half their own width; femora sublinear, sulcate, unarmed; tibiæ unguiculate at the outer apical angle, and acute or toothed at the inner angle (fig. 34 b); tarsi with the third joint somewhat narrowly bilobed, the claws very short, small, subconnate at the base; body oblong or elongate, coarsely sculptured and almost bare above.

Type, *C. fortirostris*.

Two species from Central America are referred to this genus, and *Baridius parvus*, Kirsch, from Peru, also belongs here. *Cercobaris* is nearly related to the N.-American *Desmoglyptus*, Casey, but differs from it in the form of the rostrum, antennal club, apices of the elytra, &c. All three forms have somewhat the facies of *Pseudobaris angustula*, Lec. The produced apices of the elytra are suggestive of *P. acutipennis* and its allies.

1. *Cercobaris fortirostris*, sp. n. (Tab. XXI. figg. 34, 34 a, b, ♂.)

Elongate, narrow, somewhat scaphiform, subopaque above, black, with a faint æneous tinge, almost glabrous. Head closely punctate, transversely grooved between the eyes; rostrum exceedingly stout, about as long as the head and prothorax, closely, longitudinally, strigoso-punctate. Prothorax broader than long, rather convex, gradually narrowed from the middle; coarsely, densely punctate. Scutellum rounded, rugose. Elytra oblong, transversely depressed on the disc at the base, the apices separately, horizontally produced; narrowly punctate-striate, the punctures becoming coarser towards the base, the interstices transversely rugulose, flat, the ninth raised towards the apex. Beneath coarsely, the abdomen very sparsely and finely, punctate; first ventral segment slightly depressed along the middle in the ♂. Prosternal sulcus shallow, terminating anteriorly in a faint arcuate ridge. Legs rugosely punctate; tibiæ somewhat curved externally, the anterior and intermediate pairs with a sharp tooth at the inner apical angle, in addition to the usual uncus.

Length $2\frac{1}{2}$, breadth 1 millim. (♂ ♀.)

Hab. GUATEMALA, El Tumbador, Pacific slope, 3000 feet (*Champion*).

One pair. More robust and a little larger than *C. parva* (Kirsch) (the type of which I have seen), the rostrum stouter, the apices of the elytra more produced, &c.

2. *Cercobaris brevicauda*, sp. n.

Oblong, narrow, subopaque above, black, with an æneous lustre, almost glabrous. Head closely punctate; rostrum exceedingly stout, finely strigoso-punctate. Prothorax conical, nearly as long as broad, coarsely, densely punctate. Scutellum oblong, rugose. Elytra gradually narrowing from the rounded humeri, each with a small angular prominence at the apex; rather coarsely punctate-striate, the interstices at the base not wider than the striæ, transversely rugose, flat, the ninth raised towards the apex. Beneath very coarsely, the abdomen finely, punctate. Prosternal sulcus deep, the ridge on each side extending along the basal process behind the coxæ and gradually sloping anteriorly.

Length $2\frac{1}{2}$, breadth 1 millim. (♂.)

Hab. PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

One male, somewhat imperfect. Differs from *C. fortirostris* in the deep prosternal sulcus, the walls of which extend backward behind the coxæ, the conical prothorax, the oblong scutellum, and the more coarsely punctate-striate elytra.

PHYSOBARIS, gen. nov.

Mandibles short, notched within, feebly decussate; rostrum stout, arcuate, moderately long, the antennæ inserted beyond the middle in both sexes, the club stout, globose-ovate, twice the width of the transverse penultimate joints of the funiculus, sparsely pilose and shining at the base; prothorax transverse, sinuate at the base; scutellum strongly transverse, free; elytra oblong-subtriangular, much wider than the prothorax, separately rounded at the apex, undulate on the disc, nodose towards the apex, densely sculptured; pygidium large, fully exposed, subvertical; prosternum slightly hollowed down the middle, the basal portion short and depressed; mesosternum depressed, exposed; anterior coxæ exerted, separated by about one-third of their own width; legs somewhat elongate; femora unarmed, excavate at the apex only beneath, more or less clavate; tibiæ narrow, angulate at the outer apical angle, the anterior pair with a long, the others with a shorter, apical uncus; tarsi slender, the lobes of the third joint narrow, the claws long and divergent; body oblong-ovate or elongate-ovate, metallic, dull, densely sculptured above, clothed with small, inconspicuous, adpressed, setiform scales.

Type, *P. intricata*.

This genus includes two closely allied species from the Atlantic slope of Mexico or Guatemala. It approaches *Pseudobaris*, but has the prosternum very shallowly and indefinitely sulcate, the antennæ inserted beyond the middle of the rostrum in both sexes and with a larger club, the elytra nodose towards the apex and densely sculptured, &c. The more approximate anterior coxæ, the narrow prothorax, the large, globose-ovate antennal club, &c., separate *Physobaris* from *Rhytidobaris*. The antennal club is densely pubescent to near the base in *P. intricata*, but in *P. nodosa* the basal half is shining.

1. **Physobaris intricata**, sp. n. (Tab. XXII. figg. 1, 1 α , σ .)

Baris plicata, Klug, in coll. Sallé (nec Boh.).

Oblong-ovate, flattened and dull above, shining beneath, æneous, the tip of the rostrum, the funiculus, knees, and tarsi often more or less ferruginous; sparsely clothed above and beneath with minute, ochreous, adpressed, setiform scales. Head closely punctate, shallowly transversely grooved between the eyes: rostrum slightly longer than the prothorax in the σ , a little more elongate in the φ , somewhat abruptly bent towards the tip, closely punctate; antennal club sparsely pilose at the extreme base. Prothorax much broader than long, gradually narrowing from the base, constricted in front; densely, confluent punctate. Scutellum hollowed in the middle. Elytra strongly, transversely undulate on the disc, nodose at the middle and towards the apex, the humeri rather prominent; shallowly, narrowly, sinuately punctate-striate, the interstices broad, narrowly subcostate on each side, and closely pitted down the middle with irregular series of oblong, confluent, foveiform impressions, which are as coarse as those of the striæ. Beneath coarsely, the abdomen very sparsely and finely, punctate; first ventral segment broadly excavate in the σ . Legs slender, the femora moderately clavate; anterior tibiæ with the apical uncus elongated in the σ .

Length 4-5, breadth $1\frac{4}{5}$ - $2\frac{1}{10}$ millim. (σ φ .)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*); GUATEMALA, Sabo, Sinanja, and Purula in Vera Paz (*Champion*).

Found in numbers at Sabo.

2. **Physobaris nodosa**, sp. n. (Tab. XXII. figg. 2, 2 α , σ .)

Elongate-ovate, narrow, dull above, shining beneath, æneous; sparsely clothed above and beneath with minute, ochreous, adpressed, setiform scales. Head finely punctate, shallowly, transversely grooved between the

eyes; rostrum strongly arcuate, a little longer than the head and prothorax, closely punctate; antennal club with the basal joint shining and less densely pubescent than the rest of its surface. Prothorax not much broader than long, subcylindrical, rounded at the sides anteriorly, and feebly constricted in front; densely, rugosely punctate, the punctures transversely confluent, the disc foveate on each side behind the middle. Scutellum almost flat, smooth. Elytra moderately long, the disc strongly, transversely undulate, and with a large, rounded, tuberculiform prominence towards the apex, the humeri oblique and not prominent; with rows of rather large oblong punctures placed along narrow striae, the interstices uneven, densely, irregularly, confluent punctate, and here and there narrowly subcostate at the sides, the punctures much smaller than those of the striae. Beneath coarsely, the abdomen very sparsely and finely, punctate; first ventral segment broadly excavate down the middle. Anterior femora strongly, the others more feebly, clavate; anterior tibiae slightly widened, the claw moderately long.

Length $4\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (σ .)

Hab. GUATEMALA, Purula in Vera Paz (*Champion*).

One male. More elongate than *P. intricata*, the entire basal joint of the antennal club shining, the prothorax subcylindrical, the elytra less nodose at the middle, and with the punctures of the striae much larger than those of the interstices and the humeri less prominent, the anterior legs stouter. The foveae on the prothorax may be an accidental development.

TRACHYBARIS, gen. nov.

Mandibles bifid at the tip, strongly decussate; rostrum moderately long, almost straight, the scrobes narrow, rapidly descending; antennal club stout, ovate, densely pubescent; head small; eyes narrow, strongly transverse; prothorax gibbous, shortly tubulate in front, very deeply sinuate at the base, the hind angles projecting as far backwards as the truncated median lobe; scutellum free, flat, transversely quadrate; elytra lobed at the base, nodose, the humeri oblique, leaving the upper portion of the mesothoracic epimera largely exposed from above; pygidium fully exposed, vertical, strongly transverse; prosternum flattened, with two oblique, impressed lines in front, the basal process broad; mesosternum depressed, exposed; anterior coxae large, exerted, separated by rather more than their own width; femora feebly clavate, unarmed, obsolete sulcate beneath; tibiae strongly unguiculate and also armed with a sharp tooth at the inner apical angle; tarsi rather slender, with the bilobed third joint well-developed, the claws long, contiguous at the base; body robust, oblong-ovate, metallic, rugose and nodose, almost glabrous above.

Type, *T. cæolata*.

The single species upon which this genus is based cannot be included under *Baris*, even in the widest sense. The long, almost straight rostrum, the lobed base of the elytra, the prominent, largely developed mesothoracic epimera, and the rugose, tuberculate upper surface of the body are characteristic. The widely separated anterior coxae, the prominent mesothoracic epimera, &c., separate *Trachybaris* from *Lepidobaris*.

1. *Trachybaris cæolata*, sp. n. (Tab. XXII. figg. 3, 3a, ♀.)

Opaque, shining along the middle beneath, cupreous, the depressed portions of the elytral surface greenish.

Head rugosely punctate; rostrum about as long as the head and prothorax, moderately stout, slightly arched above (as seen in profile), almost straight and flattened beneath, densely, longitudinally rugose, the antennae inserted near the middle. Prothorax strongly transverse, somewhat rounded at the sides, abruptly narrowed in front; densely, rugosely punctate and sparsely granulate, here and there nodose, depressed along the middle at the base, and with a small λ -shaped hump in the centre and a short oblique

ridge on each side of it anteriorly. Scutellum rugose. Elytra wider than the prothorax, moderately long, concave and undulate on the disc, with a subangular, laterally projecting prominence behind the similarly-shaped humeri; very shallowly, narrowly, and irregularly punctate-striate, the interstices uneven, alutaceous, and rugosely punctate, here and there longitudinally raised, the fifth with a very large, oblong, and the seventh with a much smaller, tubercle near the apex, the apices also with a prominent flattened tubercle. Beneath closely punctate, rugose and alutaceous along the sides. Prosternum slightly hollowed down the middle. Legs alutaceous, strongly rugose, and subgranulate.

Length $6\frac{1}{2}$ – $8\frac{1}{4}$, breadth $3\frac{1}{8}$ –4 millim. (♀.)

Hab. MEXICO, Toxpan in Vera Cruz (*Sallé*).—COLOMBIA (*coll. Pascoe, in Mus. Brit.*).

Two females, differing only in size. A remarkable form and unlike any other Barid known to me.

BUSCKIA, gen. nov.

Mandibles curved, toothed within, decussate; mentum strongly transverse; rostrum very short, curved, stout, widened towards the tip, the scrobes oblique and rapidly descending; antennæ with a closely-articulated, stout, gradually widened funiculus, the shining basal joint of the club * cylindrical and forming a continuous outline with it, the club scarcely longer than the two preceding joints united, pointed, and with its three outer joints extremely short and closely pubescent (fig. 4*b*); prothorax shortly tubulate in front, deeply bisinuate at the base; scutellum free, concave, transverse; elytra broad, subcordate; pygidium subvertical, ventrally exposed, strongly transverse; prosternum with two short, impressed, oblique lines extending forward to the deep transverse subapical groove, the basal process broad, flattened, and notched in the middle behind; mesosternum depressed, exposed; anterior coxæ separated by fully their own width; legs short; femora excavate at the apex only beneath, the anterior pair with a minute tooth; tibiæ short, broad, angularly dilated near the base and at the apex externally (fig. 4*c*); tarsi with the bilobed third joint broad, the claws minute and connate at the base; body robust, broad, rhomboid-ovate, almost glabrous above.

Type, *B. lecythidis*.

The type of this remarkable new genus, which has more the facies of a *Contrachelus* or *Rhyssomatus* than of a Barid, was found breeding in the nuts of a species of *Lecythis* † on the canal-zone at Panama, in July 1907, by Mr. Aug. Busck. The structure of the antennæ is unique, so far as I am aware, amongst the Barids, the club here forming a continuous outline with the funiculus. The tibiæ are formed as in *Pseudoptatus*, *Acanthobaris*, and various *Diorymeri*.

1. *Busckia lecythidis*, sp. n. (Tab. XXII. figg. 4, 4*a-c*, ♀.)

Opaque and alutaceous above, shining beneath, black; the punctures on the under surface and legs each bearing a very minute setiform scale. Head finely punctate, shallowly foveate between the eyes, the latter large; rostrum much shorter than the prothorax, finely punctate, the antennæ inserted at about the middle, the joints 3–7 of the funiculus transverse, the first joint of the club almost bare. Prothorax transverse, gradually narrowing from the base to the short tubulate portion; densely, finely punctate, the narrow interspaces raised, sinuous, and confluent, forming longitudinal rugæ, the disc with indications of a smooth median line. Elytra much wider than the prothorax, undulate, narrowly punctate-striate, the punctures sharply defined, the interstices densely alutaceous, broad, flat, each one (the sutural excepted) with a much interrupted, sharp, narrow, median ridge, the ridges becoming more complete at the sides.

* It is less elongate than shown in our figure 4*b*.

† Order Myrtaceæ. ? *L. coriacea*, DC. (cf. Biol. Centr.-Amer., Botany, i. p. 414).

Beneath closely punctate, the first ventral segment broadly flattened in the middle in the ♂, the pygidium sloping ventrally and not visible from above.

Length $5\frac{1}{4}$ – $5\frac{3}{4}$, breadth 3 – $3\frac{1}{2}$ millim. (♂ ♀.)

Hab. PANAMA, Boqueron, 60 miles south of Tabernilla (*Busck, in U.S. Nat. Mus.*).

Numerous examples, kindly communicated by the Director of the Smithsonian Institution for description.

CHRYSOBARIS, gen. nov.

Mandibles short, decussate; rostrum separated from the head by a transverse groove, stout, strongly, abruptly areolate, moderately long, the antennæ inserted at or near the middle, the antennal club ovate, densely pubescent, and rather small; prothorax deeply sinuate at the base; scutellum small, free, rounded; elytra angularly produced at the apex; pygidium exposed, subvertical, strongly transverse; prosternum with two foveæ in the transverse subapical groove, and a fine longitudinal ridge extending down from them exteriorly to the coxæ, the median space slightly hollowed; anterior coxæ separated by about their own width; legs short; femora unarmed, sulcate; tarsi slender, with third joint narrowly bilobed, the claws long, subconnate or narrowly separated at the base; body oblong-ovate, metallic, setulose or glabrous above. Type, *C. plurisetosa*.

The three small species placed under this genus have the elytra, &c., formed as in *Pseudobaris acutipennis* and its allies, but they cannot be satisfactorily treated as congeneric, on account of the bifoveate, feebly sulcate prosternum and the abruptly bowed rostrum. *C. plurisetosa* has a somewhat dense setiform vestiture; the other two species are glabrous and very rugose above, and have a longer dentiform prominence at the apex of each elytron.

1. *Chrysobaris plurisetosa*, sp. n. (Tab. XXII. figg. 5, 5 a, b, ♀.)

Somewhat convex, very finely alutaceous, moderately shining, æneous or cupreo-æneous; the upper surface clothed with rather long, adpressed, pallid or golden, setiform scales, which are condensed into one or two dense lines down each elytral interstee (fig. 5 b), the vestiture sparser and finer beneath. Head closely punctate, deeply, transversely grooved between the eyes; rostrum about as long as the head and prothorax, abruptly bowed from the base, densely punctate, smoother at the tip, the antennæ inserted at a little behind the middle. Prothorax transverse, gradually narrowing from the base, feebly constricted in front; densely punctate, with indications of a smooth median line. Scutellum rugose. Elytra wider than the prothorax, gradually narrowing from the rounded humeri, angularly produced at the apex; finely punctate-striate, the interstices broad, flat, transversely rugulose, and closely, finely uniseriate-punctate, the third somewhat confusedly produced. Beneath very coarsely, the ventral segments sparsely and finely, punctate. Prosternum with a transverse, posteriorly widened, sharply-defined excavation in front, enclosing the two deep foveæ. Femora coarsely punctate.

Length $2\frac{2}{5}$ – $2\frac{1}{2}$, breadth $1\frac{1}{10}$ – $1\frac{1}{5}$ millim. (♀.)

Hab. GUATEMALA, Guatemala city, Capetillo (*Champion*).

Two specimens.

2. *Chrysobaris corrosa*, sp. n. (Tab. XXII. figg. 6, 6 a, ♂.)

Æneo-cupreous, the tip of the rostrum greenish, moderately shining, subglabrous. Head densely, rugulosely punctate, shallowly, transversely grooved between the eyes; rostrum about as long as the head and prothorax, densely, rugulosely punctate, much smoother at the tip, the antennæ inserted at the middle.

Prothorax transverse, arcuately narrowing from the base, feebly constricted in front, obsoletely bifoveate on the disc; closely pitted with rather coarse rounded punctures, the interspaces raised and reticulate. Elytra much wider than the prothorax, subtriangular, the humeri somewhat prominent, the apices each armed with a short dentiform prominence; finely punctate-striate, the striæ becoming wider and more coarsely punctured anteriorly, the interstices closely, transversely rugose and feebly uniseriate-punctate, narrow at the base, the fifth longitudinally raised at its point of termination. Beneath very coarsely, the ventral segments more sparsely and finely, punctate; first ventral segment slightly depressed down the middle. Prosternum simply bifoveate in front. Femora very rugose.

Length $2\frac{1}{4}$, breadth $1\frac{1}{8}$ millim. (♂.)

Hab. GUATEMALA, Chiacam in Alta Vera Paz (*Champion*).

One specimen. The rugose sculpture, the somewhat dilated humeri, the more divergent, dentiform, apical prominences, the simply bifoveate prosternum, and the almost glabrous surface separate this species at a glance from *C. plurisetosa*.

3. *Chrysobaris cothurus*, sp. n. (Tab. XXII. figg. 7, 7a, ♂.)

Very like *C. corrossa*, æneous in colour; the prothorax more constricted in front and deeply bifoveate on the disc; the elytra strongly undulate, obliquely compressed at the sides below the humeri (the margins thus appearing sinuate), the interstices less rugose, polished, and more distinctly uniseriate-punctate, narrowly costate towards the base and apex, the fifth more raised at its point of termination, the apical protuberances less abrupt; the prosternum simply bifoveate in front.

Length $2\frac{1}{2}$, breadth $1\frac{1}{8}$ millim. (♂.)

Hab. MEXICO, "Sierra de Durango" (*Höge*).

One specimen, kindly presented to us by Signor Solari. The polished uneven interspaces of the elytra give a glittering appearance to the upper surface of this insect. The locality Durango requires confirmation.

CHALCOBARIS, gen. nov.

Mandibles short, decussate; rostrum long, stout, arcuate, separated from the head by a transverse groove; antennæ (fig. 8a) with a stout, clongate-ovate, densely pubescent club, which is longer than joints 2-7 of the funiculus united, the latter transverse, closely articulated, and widening outwards; prothorax deeply sinuate at the base, conical, the sides forming a continuous outline with the oblique humeri; scutellum small, rounded, free; elytra subcordate; pygidium exposed, declivous; prosternum with two deep foveæ near the apex, and a fine longitudinal ridge extending down from each of them exteriorly to the coxæ, the median space flattened, the basal process broadly truncate; anterior coxæ separated by nearly their own width; femora unarmed, shallowly sulcate; tibiæ almost straight; tarsal claws minute, connate at the base; body oblong-subrhomboidal, metallic, almost glabrous.

Type, *C. panamensis*.

The type of this genus has the prosternal structure of *Chalcobaris*, but the tarsal claws are minute, the rostrum and antennal club are elongated, and the body is differently shaped. *Pseudobaris lucida* and *P. lucens* approach *C. panamensis*, but they have a sulcate, non-foveate prosternum, long tarsal claws, &c.

1. *Chalcobaris panamensis*, sp. n. (Tab. XXII. figg. 8, 8a, ♀.)

Æneous, shining. Head densely punctate; rostrum a little longer than the head and prothorax, moderately curved, densely, finely punctate at the base and much smoother thence to the tip, the antennæ inserted

at about the basal third. Prothorax obliquely narrowed from the base, feebly constricted in front; densely, coarsely umbilicate-punctate. Elytra rather short, narrowly punctate-striate, the interstices broad, flat, transversely rugose, closely uniseriate-punctate. Beneath densely, the abdomen more shallowly, umbilicate-punctate.

Length $2\frac{3}{4}$ – $2\frac{4}{5}$, breadth $1\frac{1}{3}$ – $1\frac{2}{3}$ millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*), Tabernilla, Canal zone (*Busck*, in *U.S. Nat. Mus.*).

Two females. It is possible that the male may have a still longer antennal club. The close umbilicate puncturing of the under surface is a striking character in this insect.

BARIS.

Baris, Germar, Ins. Spec. Nov. p. 197 (1824) (part.); Casey, Ann. N. York Acad. Sci. vi. pp. 465, 469.

Baridius, Schönherr, Gen. Curc. iii. p. 643 (1836) (part.).

I follow Casey in restricting the genus *Baris*, Germ. (type, *timida*, Rossi) (= *Baridius*, Schönh., type *viridanus*, Boh.), for the numerous American species with the base of the antennal club more or less shining and sparsely pilose, the rostrum short and stout, the prosternum unimpressed or indefinitely sulcate (except in *B. quadratipennis* and *B. prodita*), and the pygidium exposed, either ventrally or dorsally. This definition, however, as stated by Casey, will not strictly apply to many of the Palæarctic species at present referred to it. As thus limited, *Baris* includes about fifty perfectly homogeneous forms from N. America, and many others from Central and S. America, though it is not so well represented in our region as *Pseudobaris*, Lec. *B. quadratipennis* and *B. prodita* have the base of the antennal club shining and the prosternum more or less sulcate (thus combining the characters of *Baris* and *Pseudobaris*), the prothorax tubulate, &c., and they will probably have to be removed eventually. The Nicaraguan *B. fervida* and its allies are large, metallic, coarsely punctured, peculiar forms restricted to Tropical America. *B. strenua*, *B. striata*, *B. sulcipennis*, *B. sinuatirostris*, &c., are characteristic N.-American or Mexican Barids, some of which extend down the central plateau to Guatemala. *B. area* and the small metallic Tropical-American insects related to it are so variable and so imperfectly segregated, that I am unable to come to any definite conclusion concerning them, though hundreds of specimens (including long series from many localities) have been studied for the purpose. The males of the Central-American forms have the posterior portion of the metasternum and the first ventral segment more or less excavate or flattened in the middle, and the apical margin of the fifth segment sometimes thickened or sublamellate in the centre, and the prominence limited on each side by a semicircular or shallow excision. The pygidium, too, in that sex is often separated from the last dorsal segment by a sharply defined transverse suture or ridge (*B. durangoana*, *B. zapotensis*, *B. area*, &c.); but this suture is sometimes wanting in certain

species, as in the female, and sometimes covered by the apices of the elytra. In *B. fervida*, *B. fluctuosa*, &c. the strongly unguiculate tibiæ are more or less dentate at the inner apical angle in the female, this tooth being obsolete in the male. The S.-American *Baridius ferrugo*, *B. ænescens*, *B. ater*, *B. erubescens*, and *B. smaragdinus*, Kirsch, belong to *Baris* as here understood*.

The following table will assist in the identification of the Central-American species; some of those numbered 22–30, however, still require further investigation, several of them having been described by Boheman or Solari from single specimens only:—

- a. Tibiæ (except in *B. occidua*) more or less dilated or toothed at the outer apical angle (appearing hollowed on their outer edge).
 - a¹. Rostrum with two undulate longitudinal ridges, and also hairy, towards the apex beneath. Frontal depression shallow. Scutellum strongly transverse. Body black or piceous.
 - a². Elytral interstices narrowly subcostate on each side, coarsely seriate-punctate down the middle Species 1–4.
 - b². Elytral interstices simply seriate-punctate Species 5, 6.
 - b¹. Rostrum without distinct ridges beneath; frontal depression sharply defined.
 - c². Body black or piceous; elytra even, the interstices uniseriate-punctate: length under 3 mm. Species 7, 8.
 - d². Body æneous; elytra uneven, the interstices more closely punctate: length 6 mm. Species 9.
- b. Tibiæ not or scarcely dilated at the outer apical angle (almost straight on their outer edge); rostrum without ridges beneath.
 - c¹. Tarsal claws long; pygidium large or moderately large.
 - c². Prothorax unimpressed or indefinitely sulcate down the middle; prothorax not tubulate in front.
 - a³. Prothorax gibbous; scutellum rather large, transverse-oval; rostrum abruptly bent at about the middle; antennal club glabrous at the extreme base only; frontal depression very shallow: species large, metallic, coarsely punctured Species 10 †.
 - b³. Prothorax feebly convex; frontal depression sharply defined.
 - a⁴. Scutellum transverse, subquadrate, or rounded, small.
 - a⁵. Body black or piceous, sometimes with a faint æneous lustre.
 - a⁶. Elytra strongly undulate, deeply sulcate, and coarsely punctured Species 11.
 - b⁶. Elytra more even, less coarsely punctured Species 12–15.
 - b⁵. Body in part rufescent, the elytra almost bare Species 16.
 - c⁵. Body more or less metallic, the elytra in some of the species (*B. aspera*, *B. setosella*, *B. inopina*) closely setulose Species 17–30.

* It may be noted here that *Baridius collaris*, Boh., belongs to *Loboderinus*, Solari, whose two species, *clavatus* and *basalis*, are probably ♂ and ♀ respectively of Boheman's insect.

† *B. metallica*, *B. metallescens*, *B. catenulata*, and *B. viridana*, Boh., and *B. interpunctatus*, Germ., are allied S.-American forms.

- b*¹. Scutellum oblong, narrowed posteriorly; elytral interstices broad and minutely uniseriate-punctate; body æneo-piceous Species 31.
- d*². Prosternum sulcate; prothorax abruptly tubulate in front; elytral interstices each with a scattered row of fine, slender setæ; frontal groove deep; body black: length 3-4½ mm.
- c*³. Rostrum arcuate above and concave beneath; scutellum small, subtriangular; prosternal sulcus shallow Species 32.
- d*³. Rostrum arcuate above and broadly flattened beneath; scutellum larger; prosternal sulcus deep Species 33.
- d*¹. Tarsal claws small; pygidium very short, vertical; frontal depression shallow; prosternum unimpressed; elytra costate at the apex; body oblong, polished, rufescent: length 2½ mm. Species 34.

1. **Baris ingens.** (Tab. XXII. figg. 9, 9 *a*, ♂.)

Baris ingens, Casey, Ann. N. York Acad. Sci. vi. pp. 471, 476¹.

Hab. NORTH AMERICA, Arizona¹.—MEXICO (*Mus. Brit.*), Northern Sonora (*Morrison*), Ciudad and Ventanas in Durango (*Höge*), Yolotepec in Oaxaca (*Sallé*).

This is the largest of the N.-American species of *Baris*, and like some of its allies extends southward into Mexico or Guatemala. It is probably a large form of *B. striata*, with the vestiture of the elytra, pygidium, and under surface a little longer and more abundant. In some of the Mexican specimens the second and third elytral interstices are more or less biseriate-punctate.

2. **Baris striata.**

Baridius striatus, Say, Descr. N. Am. Curc. p. 17 (July 1831)¹; Complete Writings, i. p. 281².

Baris striata, Lec. Proc. Am. Phil. Soc. vi. p. 291³; Casey, Ann. N. York Acad. Sci. vi. pp. 471, 477⁴.

Baridius mexicanus, Sturm, in litt.⁵.

Hab. NORTH AMERICA^{1 2 4}, Michigan to Arizona³.—MEXICO⁵ (*Mus. Brit.*), Omilteme in Guerrero 8000 feet (*H. H. Smith*); GUATEMALA, Dueñas (*Champion*).

The seven specimens from Mexico referred to this species are very like *B. strenua*, but they have the prothorax less rounded at the sides and a little narrower, the elytra somewhat longer, and the vestiture of the latter and of the under surface sparser and finer. The punctures on the prothorax are large and here and there confluent. In both insects the coarse seriate punctures on the elytra are so closely placed as to make the lateral portions of the interstices appear subcostate.

3. **Baris strenua.** (Tab. XXII. figg. 10, 10 *a*, ♂.)

Baridius strenuus, Lec. Proc. Acad. Phil. 1868, p. 363¹.

Baris strenua, Lec. Proc. Am. Phil. Soc. xv. p. 290²; Casey, Ann. N. York Acad. Sci. vi. pp. 472, 480³.

Baridius punctatissimus, Dugès, in litt.⁴.

Hab. NORTH AMERICA, Wisconsin^{1 2}, Kansas^{1 2 3}, Montana³, New Mexico², Texas³, Arizona³.—MEXICO⁴ (*coll. Solari*), Cuernavaca (*Sallé, Wickham*), Toluca, Puente de Ixtla (*Wickham*), Chilpancingo, Amula, and Tepetlapa (*H. H. Smith*), Guanajuato, Toxpan, Yolos (*Sallé*), Cordova (*Höge*), Temax in N. Yucatan (*Gaumer*); GUATEMALA, San Gerónimo (*Champion*).

Found in numbers at Cuernavaca and Temax, and singly in Guatemala. A broad form, with prominent ridges on the underside of the rostrum towards the tip, comparatively short elytra, a strongly transverse prothorax, and conspicuous vestiture, the elytral interstices narrowly subcostate on each side and coarsely uniseriate-punctate down the middle. Colonel Casey has kindly sent us specimens of *B. strenua*, from Kansas, for comparison, and also of *B. umbilicata*, Lec, the latter chiefly differing from *B. strenua* in the less prominent humeri and the non-costate elytral interstices. The examples before me measure: length 4–6, breadth $2\frac{1}{10}$ –3 mm.

4. **Baris sinuatirostris**, sp. n. (Tab. XXII. figg. 11, 11 a, ♀.)

Oblong-ovate, subopaque, nigro-piceous or black, the anterior margin of the prothorax, the tip of the rostrum, and legs, and in one specimen the elytra also, rufescent; the elytra with a row of short, semierect setæ along each interstice, the punctures on the under surface and legs also bearing small setiform scales. Head closely punctate, transversely grooved between the eyes; rostrum stout, arcuate, a little shorter than the prothorax, coarsely, closely punctate, with two undulate longitudinal ridges towards the apex beneath. Prothorax strongly transverse, rounded at the sides anteriorly, narrow at the apex; densely pitted with very coarse, rounded punctures. Scutellum strongly transverse. Elytra a little wider than the prothorax, gradually narrowing from the rounded humeri; punctato-sulcate, the interstices slightly wider than the sulci, narrowly subcostate on each side, and each with a closely-packed row of coarse punctures down the middle. Beneath coarsely, closely punctate; first ventral segment excavate down the centre in the ♂. Anterior coxæ rather narrowly separated. Tibiæ somewhat hairy, sharply dilated at the apex externally, the anterior pair sinuate within in the ♂. Length $3\frac{1}{2}$ – $3\frac{2}{3}$, breadth $1\frac{4}{5}$ – $1\frac{2}{10}$ millim. (♂ ♀.)

Hab. MEXICO, San Angel, Distrito Federal (*Wickham*).

One pair, captured during the past year by Mr. Wickham. Smaller and duller than *B. strenua*, Lec., the prothorax still more densely punctate, the legs at least rufescent, the entire under surface very coarsely and closely punctured in both sexes. The punctures of the elytral interstices are as coarse as those of the striæ.

5. **Baris sulcipennis**. (Tab. XXII. figg. 12, 12 a, ♀.)

Baris sulcipennis, Brisout, Ann. Soc. Ent. Fr. 1870, pp. 37, 49¹; v. Heyden, Deutsche ent. Zeitschr. 1882, p. 255².

Baridius puncticollis, Sturm, in litt. (nec Boh.)³.

Hab. MEXICO^{2 3} (*Sallé, ex coll. Sturm*), Chilpancingo and Tepetlapa in Guerrero (*H. H. Smith*), Cuernavaca, Puente de Ixtla (*Wickham*), Juquila in Oaxaca (*Sallé*); GUATEMALA, Dueñas, Capetillo (*Champion*).

Dr. Lucas v. Heyden has been kind enough to communicate the type of this species, which was said to have been found in Germany¹. It is not the *B. puncticollis* of

Boheman * as he supposed², but a true *Baris* very nearly related to *B. strenua*, Lec., differing from that insect in its average smaller size and the non-costate sides of the elytral interstices. The smooth median line on the prothorax is usually very conspicuous. The intermediate and posterior tibiae are sharply dilated at the outer apical angle. The first ventral segment is deeply excavate down the middle in the male, as in the allied forms. Mr. Wickham has recently found *B. sulcipennis* in some abundance at Cuernavaca. Four specimens only were found in Guatemala, in the valley between the Volcanos Agua and Fuego. The examples before me measure: length 3-4½, breadth 1½-2 mm.

6. *Baris spissirostris*, sp. n. (Tab. XXIII. figg. 1, 1 a, ♂.)

♀. Oblong-ovate, shining, black or piceous, the tarsi ferruginous; the punctures on the elytral interstices, under surface, and legs each bearing a small scale. Head sparsely, minutely punctate, shallowly, transversely grooved between the eyes; rostrum very stout, feebly curved, much shorter than the prothorax, closely punctate, slightly sinuate beneath (when viewed in profile). Prothorax transverse, feebly constricted in front; coarsely, very closely punctate, and with an abbreviated smooth median line. Scutellum strongly transverse. Elytra slightly wider than the prothorax, deeply punctate-striate, the interstices coarsely uniseriate-punctate throughout. Beneath closely punctate. Intermediate and posterior tibiae acutely dentate at the outer apical angle.

Length 3-3½, breadth 1½-1½ millim.

Hab. MEXICO (*Mus. Brit.*).

Two females, one found by Truqui. Extremely like *B. regularis*, but with a straighter, shorter, and much stouter rostrum, the prothorax slightly constricted in front, and the elytral interstices bearing larger squamules, the insect in this respect approaching *B. sulcipennis*, which, however, has a longer and more curved rostrum, a more coarsely punctured prothorax, &c.

7. *Baris regularis*, sp. n.

♂. Oblong, rather convex, narrow, shining, nigro-piceous, the antennae, apical margin of the elytra, tip of the rostrum, and legs reddish; the punctures on the elytral interstices, under surface, and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum moderately stout, feebly arcuate, shorter than the prothorax, closely punctate. Prothorax transverse, rounded at the sides anteriorly, very closely, coarsely punctate, with or without an incomplete smooth median line. Scutellum small, strongly transverse, concave. Elytra considerably wider than the prothorax, deeply punctate-striate, the interstices rather narrow, flat, regularly and rather coarsely uniseriate-punctate throughout. Beneath closely punctate; first ventral segment deeply excavate down the middle. Intermediate and posterior tibiae sharply dentate at the outer apical angle.

Length 2½-2½, breadth 1⅞ millim.

Hab. MEXICO, Chilpancingo in Guerrero (*H. H. Smith*).

Three males. Near *B. sulcipennis*, but much smaller, narrower, and more convex, the rostrum not so stout, the legs rufescent, the prothorax moderately coarsely punctate, the scales on the elytral interstices minute, the elytra appearing glabrous at first sight.

* Cf. anteà, pp. 425, 449, 450.

8. *Baris occidua*, sp. n. (Tab. XXIII. figg. 2, 2 *a*, ♀.)

Oblong-ovate, narrow, convex, shining, nigro-piceous, the legs reddish and antennæ (the club excepted) rufescent; glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, transversely grooved between the eyes; rostrum moderately stout, arcuate, as long as the prothorax, sparsely punctate; antennal club rotundate-ovate, shining at the base. Prothorax slightly broader than long, subcylindrical, rounded at the sides anteriorly, narrow at the apex; coarsely, closely punctate. Scutellum very small, transverse. Elytra a little wider than the prothorax, gradually narrowing from the base, depressed along the suture anteriorly; punctato-sulcate, the interstices narrow, flat, each with a single row of scattered rather coarse punctures. Beneath coarsely, the abdomen sparsely and more finely, punctate. Tibiæ almost straight. Length $2\frac{1}{2}$ – $2\frac{7}{8}$, breadth $1\frac{1}{10}$ – $1\frac{1}{8}$ millim. (♀.)

Hab. MEXICO, Cuernavaca in Morelos (*Wickham*), Omilteme in Guerrero (*H. H. Smith*).

Two specimens. Narrower and relatively longer than *B. regularis*, the prothorax more coarsely and less densely punctate, the elytral interstices very little wider than the sulci and with fewer punctures, the tibiæ not dilated at the outer apical angle.

9. *Baris fluctuosa*, sp. n. (Tab. XXII. figg. 13, 13 *a-c*, ♂; 14, ♀.)

Oblong-ovate, broad, shining, æneous; almost glabrous above, the punctures on the pygidium, under surface, and legs each bearing a small scale. Head sparsely punctate, transversely grooved between the eyes; rostrum stout, arcuate, shorter than the prothorax, closely punctate, smoother at the tip. Prothorax transverse, rounded at the sides, feebly constricted and much narrowed in front; closely, coarsely punctate, except along the smooth median line. Scutellum transverse, hollowed in the middle. Elytra considerably wider than the prothorax, gradually narrowed from the rounded, somewhat prominent humeri, undulate on the disc; narrowly punctato-sulcate, the interstices broad, flat, rather coarsely, closely, irregularly biseriate-punctate. Beneath coarsely and closely, a space down the middle of the abdomen more sparsely and finely, punctate. Tibiæ widened and dentate at the outer apical angle.

♂. Anterior tibiæ strongly sinuate, hairy within (fig. 13 *b*); first ventral segment excavate, the fifth with a small lamelliform prominence at the middle of the apical margin, on either side of which is a deep semicircular emargination (fig. 13 *c*).

♀. Anterior tibiæ toothed at the inner apical angle (fig. 14).

Length 6– $6\frac{1}{2}$, breadth 3– $3\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Omilteme in Guerrero 8000 feet (*H. H. Smith*).

Two specimens. More elongate than *B. strenua* and *B. sulcipennis*, æneous in colour, the rostrum almost bare and not ridged beneath, the elytra undulate, their interstices irregularly biseriate-punctate, the punctures each bearing an excessively minute scale, the last ventral segment of the male abruptly bi-emarginate at the apex, much as in *B. fervida*.

10. *Baris fervida*. (Tab. XXII. figg. 15, 15 *a*, ♀.)

Baris fervida, Pasc. Ann. & Mag. Nat. Hist. (5) xvii. p. 426 (1886)¹.

♂. First ventral segment broadly flattened, the fifth abruptly, semicircularly notched at the apex on either side of the transverse lamelliform median piece; tibiæ strongly unguiculate, without tooth at the inner apical angle.

♀. Tibiæ sharply dentate at the inner apical angle.

Hab. NICARAGUA (*Sallé*), Chontales¹ (*Belt, Janson*).

A large, shining, golden-cupreous, almost glabrous form, with a short, abruptly bent, apically flattened rostrum, a gibbous, coarsely punctured prothorax, a rather large, rounded, transverse scutellum, and undulate, deeply striate, coarsely punctate elytra, the intermediate and posterior tibiae straight on their outer edge, the prosternum hollowed to receive the antennae, the mesosternum depressed, the pygidium carinate. The six specimens received by us are all of the female sex; the type is a male. The S.-American *B. metallescens*, Boh., has similar sexual characters.

11. *Baris rugosissima*, sp. n. (Tab. XXII. figg. 16, 16 a, ♀.)

Oblong-ovate, rather dull above, shining beneath, black; the punctures on the elytral interstices, under surface, and legs each bearing a very minute scale. Head closely punctate, transversely grooved between the eyes; rostrum stout, short, barely as long as the prothorax, abruptly bowed from the middle, densely punctate. Prothorax transverse, arcuately narrowing from the base, feebly constricted in front; densely impressed with coarse, rounded punctures. Scutellum transverse. Elytra oblong, much wider than the prothorax, strongly undulate; deeply, sinuately punctate-sulcate, the interstices almost flat, densely, coarsely, uniseriate-punctate, the third confusedly punctured, the ninth raised towards the apex. Beneath coarsely and closely, the abdomen more finely, punctate. Prosternum slightly depressed along the middle. Tibiae almost straight, narrow, feebly toothed at the outer apical angle.

Length $4\frac{1}{2}$, breadth 2 millim. (♀.)

Hab. MEXICO, "Sierra de Durango" (*Höge, ex Solari*).

One specimen, kindly presented to us by Signor Solari. An isolated form, with strongly undulate elytra, the punctures in the interstices as coarse as those of the striae, the prothorax coarsely punctate, the rostrum short and strongly bowed, the tibiae narrow. *B. aspera* is perhaps the nearest allied Central-American species.

12. *Baris zapotensis*, sp. n.

Elongate-ovate, shining, black, the legs and antennae piceous or rufo-piceous; glabrous above, the punctures on the elytra and under surface each bearing a minute scale. Head very sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum abruptly arcuate from the base, moderately stout, shorter than the prothorax, sparsely, finely punctate. Prothorax transverse, abruptly narrowed in front, the sides subparallel behind; sparsely punctate, except along the smooth median line. Scutellum small, rounded. Elytra a little wider than the prothorax, oblong, gradually narrowing from the rounded humeri, feebly undulate on the disc and depressed along the suture from a little below the base to the apex; with sharply-cut, narrow, faintly punctured striae, the interstices broad, flat, narrowly costate at the apex, each with a row of minute scattered punctures. Pygidium separated from the short exposed portion of the last dorsal segment by a sharply defined transverse suture in the ♂, entire in the ♀. Beneath sparsely punctate. Prosternum depressed along the middle. Tibiae almost straight.

♂. First ventral segment somewhat flattened and the fifth with the apical margin slightly thickened at the middle.

Length $3\frac{1}{3}$ – $3\frac{2}{3}$, breadth $1\frac{1}{2}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. GUATEMALA, Zapote, Pacific slope (*Champion*).

Six examples. An oblong black form, with a very short rostrum, abruptly narrowed prothorax, a small scutellum, and sharply striate elytra, which are depressed along

the suture from near the base and narrowly costate at the apex. *B. atra*, Kirsch, from Colombia, is an allied, larger species, with more uneven and more coarsely punctate-striate elytra, longer apical uncus to the tibiæ in the male, &c.

13. *Baris durangoana*, sp. n. (Tab. XXII. figg. 17, 17 *a*, *b*, ♂; 18, ♀.)

Oblong-ovate, rather dull, nigro-piceous, the antennæ, tip of the rostrum, and legs reddish; the elytra somewhat thickly clothed with very small whitish squamules, the punctures at the sides of the prothorax and on the under surface and legs also bearing minute scales. Head sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum very short, moderately stout, strongly arcuate, closely punctate throughout in the ♂, smoother at the tip in the ♀. Prothorax rather convex, transverse, rounded at the sides; coarsely, closely punctate, with or without a narrow smooth median line. Scutellum very small, subquadrate. Elytra slightly wider than the prothorax, with narrow, sharply-cut, feebly punctured striæ, the interstices flat, closely, rugosely punctate, 2 and 3 with an irregular double row of impressions. Pygidium large, bisegmentate in the ♂ (fig. 17 *b*), without trace of transverse suture in the ♀ (fig. 18). Beneath closely punctate; fifth ventral segment of the ♂ arcuate-emarginate at the apex, leaving the lower surface of the convex pygidium partly exposed. Prosternum unimpressed. Tibiæ almost straight.

Length $4-4\frac{1}{2}$, breadth $1\frac{4}{5}-2\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Presidio and Villa Lerdo in Durango (*Höge*).

A pair from Presidio, taken as the types, and an immature male from Villa Lerdo. In this insect the elytral interstices are densely, rugosely punctate and somewhat thickly clothed with very small whitish squamules. *B. durangoana* approaches the Californian *B. rubripes*, Casey (two males of which are before me), but it has the prothorax more rounded at the sides, the elytra more rugose, &c. The pygidium is equally extended in the specimens described, and in the male it is divided into two segments by a transverse suture.

14. *Baris transversa*.

Baridius transversus, Say, Descr. N. Am. Curc. p. 18 (July 1831)¹; Complete Writings, i. p. 282².

Baris transversa, Casey, Ann. N. York Acad. Sci. vi. pp. 473, 487³ *.

Hab. NORTH AMERICA^{1 2}, New York to Texas³.—MEXICO (*Mus. Brit.*).

There is a specimen (♂) of a *Baris* in the Pascoe collection at the British Museum, labelled "Mexico," agreeing very nearly with an insect sent me by Colonel Casey as *B. transversa*, Say (= *interstitialis*, Say), and Mr. Wickham has also forwarded examples of it from Texas under the name *B. soluta*, Casey †. The Mexican insect has the prothorax almost as broad as the elytra, rounded at the sides, and coarsely, closely punctate; the scutellum small and distinctly transverse; the elytral interstices coarsely, closely punctate, the punctures each bearing a very small setiform scale; the rostrum short

* For the synonymy, see Casey (*loc. cit.*).

† This insect will doubtless be found in Northern Mexico, as Mr. Wickham has taken it at Brownsville, Texas just across the Rio Grande.

and abruptly bowed from the base; the prosternum somewhat deeply excavate; the tibiæ almost straight; and the fifth ventral segment broadly flattened down the middle.

15. **Baris rotundicollis**, sp. n. (Tab. XXII. figg. 19, 19 *a*, ♀.)

Oblong-ovate, rather broad, very finely alutaceous, æneo-piceous, the legs reddish; the punctures at the sides of the prothorax, along the elytral interstices, and on the under surface and legs each bearing a minute setiform scale. Head minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, moderately stout, short, finely punctate. Prothorax rather convex, much broader than long, rounded at the sides, narrow in front; closely, rather coarsely punctate, except along the smooth median line. Scutellum very small, rounded, concave. Elytra a little wider than the prothorax, very gradually narrowing from the rounded humeri; narrowly, deeply striate, the striæ feebly punctate, the interstices broad, flat, 2 and 3 confusedly, the others closely and uniseriately, punctate, the ninth raised towards the apex. Beneath closely, the median portion of the first two ventral segments more sparsely and finely, punctate. Tibiæ almost straight.

Length $3\frac{2}{3}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, San Pedro in Coahuila (*Palmer*).

One specimen. Smaller and less convex than *B. transversa*, the upper surface with an æneous lustre and not so coarsely punctured, the interstitial punctuation on the elytra much finer. The prothorax is more rounded at the sides than in the other allied Central-American forms.

16. **Baris subrubra**, sp. n. (Tab. XXII. figg. 20, 20 *a*, ♀.)

Oblong-ovate, rather convex, shining, nigro-piceous, the elytra, legs, and antennæ rufescent; almost glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum strongly arcuate, stout, much shorter than the prothorax, very finely punctate. Prothorax transverse, rounded at the sides anteriorly; closely, somewhat coarsely punctate, except along the incomplete smooth median line. Scutellum small, rounded-subquadrate, shallowly sulcate. Elytra a little wider than the prothorax, very gradually narrowing from the rounded humeri; with narrow, deep, feebly punctured striæ, the first (sutural) becoming deeper from a little below the base, the interstices broad, almost flat, 2 and 3 irregularly bi-, the others uni-, seriate-punctate, 9 raised towards the apex. Beneath closely, the abdomen sparsely, punctate. Intermediate and posterior tibiæ almost straight.

Length 4, breadth 2 millim. (♀.)

Hab. MEXICO (*Truqui*, in *Mus. Brit.*).

One specimen. Not unlike *B. deformis*, Casey, but larger and more elongate, the upper surface more coarsely punctate, the prothorax not sinuate at the sides, the elytra rufescent, &c. The reddish colour of the legs (like that of the elytra) is probably not due to immaturity, several of the allied N.-American forms resembling *B. subrubra* in this respect.

17. **Baris cavernosa**, sp. n. (Tab. XXII. figg. 21, 21 *a*, ♂.)

♂. Oblong-ovate, broad, shining, æneous; almost glabrous above, the punctures on the under surface and legs each bearing a small scale. Head sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum strongly arcuate, stout, much shorter than the prothorax, closely punctate. Prothorax

rather convex, broader than long, narrow in front, rounded at the sides anteriorly; closely, coarsely punctate, except along the smooth median line. Scutellum small, transverse, concave. Elytra at the base considerably wider than the prothorax, gradually narrowing from the rather prominent rounded humeri, strongly undulate on the disc; deeply punctate-striate, the interstices broad, rather coarsely and closely uniseriate-punctate, 3 with an irregular double row of punctures. Pygidium with indications of a transverse suture between it and the last dorsal segment. Beneath closely, the middle of the abdomen sparsely, punctate; first ventral segment broadly excavate, the fifth broadly arcuate-emarginate at the apex and with a small smooth prominence in the centre of the emargination. Tibiæ almost straight. Length $4\frac{3}{5}$, breadth $2\frac{2}{5}$ millim.

Hab. MEXICO (*Mus. Brit.*).

One male, incorrectly named *B. plicata*, Schönh., in the British Museum. Less elongate and smaller than in *B. fluctuosa*, the prothorax less rounded at the sides, the third elytral interstee only with an irregular double row of punctures, the fifth ventral segment (σ) not semicircularly excised on either side of the smooth median prominence at the apex. The seriate punctures on the elytra each bear an excessively minute scale.

18. **Baris aspera**, sp. n. (Tab. XXIII. figg. 3, 3 *a*, *b*, σ .)

Oblong-ovate, shining, æneous; the elytra somewhat thickly clothed with rather coarse, intermixed brown and whitish, setiform scales (fig. 3 *b*), the under surface and legs with small narrow whitish, and the sides of the prothorax with fulvous. scales. Head closely punctate, transversely grooved between the eyes; rostrum short and stout, strongly arcuate, not so long as the prothorax, closely punctate, smoother at the tip. Prothorax transverse, rounded at the sides anteriorly, feebly constricted in front; closely, coarsely punctate, except along the smooth median line. Scutellum small, somewhat rounded. Elytra considerably wider than the prothorax, gradually narrowing from the rather prominent humeri, more or less undulate on the disc; narrowly striate, the interstices broad, flat, closely and somewhat coarsely seriate-punctate, becoming transversely rugose towards the sides, 2-4 usually with an irregular double row of impressions. Beneath closely, the abdomen sparsely, punctate. Tibiæ almost straight.

σ . First ventral segment slightly hollowed down the centre, the fifth with a very small subangular prominence at the middle of the apical margin; pygidium connate with the last dorsal segment. Length $3-4\frac{3}{4}$, breadth $1\frac{1}{4}-2\frac{1}{3}$ millim. (σ φ .)

Hab. MEXICO (*coll. Solari*); GUATEMALA, Guatemala city (*Salvin, Champion*), Aceytuno (*Salvin*), Dueñas, Capetillo, Zapote (*Champion*); COSTA RICA, Caché (*Rogers*).

Found in numbers in Guatemala. An oblong, æneous form, with a somewhat abundant, intermixed white and brown, setiform vestiture on the elytra, &c. In the smaller examples there is but a single row of punctures on the elytral interstices. The single specimen (σ) from Costa Rica has a still more coarsely punctured prothorax, and it may not really belong to the same species.

19. **Baris tortilis**, sp. n. (Tab. XXIII. figg. 5, 5 *a*, φ .)

Oblong-ovate, somewhat flattened above, shining, æneo-piceous; the punctures on the elytral interstices each bearing an extremely minute, and those on the under surface and legs a slightly larger, setiform scale. Head very sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum stout, very short, abruptly bowed from near the base and flattened at the tip, very sparsely, minutely punctate.

Prothorax transverse, rounded at the sides anteriorly, closely, moderately coarsely punctate. Scutellum small, transverse, concave or flattened. Elytra a little wider than the prothorax, oblong, undulate on the disc; with narrow, deep, feebly punctured striae, which become sinuous and deeper at the apex, the sutural stria deeply impressed from a little below the base, the interstices broad, flat, somewhat finely and closely uniseriate-punctate (the second with a few additional punctures), subcostate towards the tip. Beneath closely, the abdomen more sparsely, punctate. Prosternum slightly depressed along the middle anteriorly. Tibiae almost straight, the anterior pair with a distinct tooth at the inner apical angle, in addition to the long apical uncus.

Length 4, breadth 2 millim. (♀.)

Hab. GUATEMALA, Capetillo (*Champion*).

Two females. Closely related to *B. aspera* and *B. cavernosa*, but with the elytral striae more deeply impressed and sinuous, and the interstices subcostate, at the apex, the interstices more finely punctate, the anterior tibiae with a distinct tooth in addition to the usual claw. The elytral vestiture is similar to that of *B. cavernosa*.

20. *Baris inopina*, sp. n. (Tab. XXIII. figg. 4, 4 a, b, ♀.)

Oblong-ovate, shining, æneous or æneo-piceous; the elytra somewhat thickly (fig. 4 b), and the prothorax, under surface, and legs a little more sparsely, clothed with decumbent setiform scales. Head closely, finely punctate, shallowly transversely grooved between the eyes; rostrum very short, a little more than half the length of the prothorax, feebly curved, closely punctate, smoother at the tip. Prothorax transverse, rounded at the sides anteriorly; densely, somewhat coarsely punctate, except along the smooth median line. Scutellum very small, transverse or subquadrate, hollowed. Elytra a little wider than the prothorax, with narrow, deep, feebly punctured striae, the interstices almost flat and densely, confusedly punctured throughout. Beneath closely punctate. Tibiae straight.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ – $1\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Chilpancingo (*H. H. Smith*).

Two females. A small oblong-ovate form, with a very short feebly curved rostrum, which is separated from the head by a shallow groove, and the elytral interstices densely punctured and closely setulose. The vestiture is closer and more confusedly arranged than in the less elongate *B. setosella*.

21. *Baris æneopicea*, sp. n.

Oblong, rather broad, somewhat flattened above, shining, æneo-piceous; almost glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head minutely punctate, deeply transversely grooved between the eyes; rostrum short, stout, arcuate, finely punctate. Prothorax transverse, the sides rounded anteriorly and slightly convergent at the base; closely, somewhat coarsely punctate, except along the smooth median line. Scutellum small, transverse, sulcate. Elytra oblong, very little wider than the prothorax, subparallel at the base, slightly depressed along the suture; deeply punctate-striate, the interstices flat on the disc, much broader than the striae, the third confusedly, the others closely and uniseriately, punctate, the ninth raised posteriorly. Beneath closely and coarsely, the abdomen more finely and sparsely, punctate. Tibiae almost straight.

Length 4, breadth 2 millim. (♀.)

Hab. MEXICO, San Angel, Distrito Federal (*Wickham*).

Two females. Near *B. tortilus*, but with the elytra subparallel at the base, the

interstices more even, and the humeri less prominent, the prothorax more ample, &c. More oblong than *B. fratrueles*, the elytra relatively narrower and with flatter interstices; narrower than *B. rotundicollis*, the prothorax less rounded at the sides, &c.

22. ***Baris caldaria*.** (Tab. XXIII. figg. 6, 6 a, ♂.)

Baridius caldarius, Boh. in Schönh. Gen. Curc. viii. 1, p. 142¹.

Hab. MEXICO (coll. Germar¹; Truqui, in Mus. Brit.).

The insect sent me from Stockholm as the type of *B. caldaria* (like the specimen representing it in the British Museum) does not accord very well with Boheman's description, and the identification of the four examples here referred to the species is doubtful. They are more elongate and slightly larger than *B. corrusea* (instead of being "dimidio minor"); the prothorax is more rounded and somewhat ampliate at the sides anteriorly, and has a well-defined smooth median line; the elytral interstices are closely and finely uniseriate-punctate, the second confusedly punctured; and the rostrum is distinctly longer.

23. ***Baris implana*, sp. n.**

Oblong-ovate, narrow in the ♂, broader in the ♀, very shining, æneous, the legs rufo-piceous or reddish; almost glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head minutely punctate, transversely grooved between the eyes; rostrum strongly arcuate, short, moderately stout, very finely, sparsely punctate. Prothorax transverse, gradually narrowing from the base, feebly constricted in front; somewhat closely punctate, with or without a smooth abbreviated median line. Scutellum very small, rounded. Elytra wider than the prothorax, gradually narrowing from the rounded humeri, undulate, depressed along the suture from near the base; finely, sharply striate, the striae sometimes distinctly punctate, the interstices broad, flat, narrowly costate at the apex, each with a row of scattered very minute punctures. Beneath rather sparsely punctate; metasternum and first ventral segment hollowed in the middle in the ♂. Tibiae almost straight.

Length $2\frac{1}{2}$ – $3\frac{2}{3}$, breadth $1\frac{1}{3}$ – $1\frac{2}{3}$ millim. (♂ ♀.)

Hab. MEXICO, Jalapa (*Höge*: ♂ ♀), Jacale, Juquila (*Sallé*: ♀).

Five specimens, the female from Juquila with the striae and outer interstices somewhat strongly punctured. A form of *B. ærea*, with strongly undulate, finely striate elytra, the first (sutural) stria somewhat deeply impressed, the interstices faintly uniseriate-punctate; the male narrow, the female broader. The elytral interstices are narrowly costate at the apex, much as in *Pseudobaris acutipennis* and its allies.

24. ***Baris fratrueles*, sp. n.**

Oblong-ovate, somewhat flattened above, very finely alutaceous, shining, æneous, the legs sometimes reddish; almost glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head finely punctate, transversely grooved between the eyes; rostrum stout, arcuate, very short, closely punctate. Prothorax transverse, rounded at the sides anteriorly; closely punctate, with indications of a smooth abbreviated median line. Scutellum small, transverse. Elytra broader than the prothorax,

very gradually narrowing from the obtuse humeri; deeply punctate-striate, the interstices broad, flat or feebly convex, finely uniseriate-punctate, the third confusedly punctured, the ninth raised towards the apex. Beneath closely, the abdomen sparsely and finely, punctate; metasternum and first ventral segment deeply excavate, and the apical margin of the fifth segment distinctly thickened in the middle, in the ♂. Prosternum slightly depressed along the middle. Anterior coxæ separated by less than one-third of their own width. Tibiæ almost straight, the anterior pair with a long apical uncus in the ♂.

Length $3\frac{2}{5}$ –4, breadth $1\frac{1}{2}$ –2 millim. (♂.)

Hab. MEXICO, Toxpan, Jacale (*Sallé*), Orizaba (*H. H. Smith*), Cerro de Plumas, Oaxaca (*Höge*).

Seven specimens, all males. A large, oblong form of *B. ærea*, with the upper surface very finely alutaceous, the prothorax closely punctate, the elytra rather coarsely and deeply punctate striate, the interstices sometimes feebly convex, and the ventral excavation of the male deep. It seems to require a separate name. *B. subsimilis*, Casey, resembles *B. fratrueilis*, but is less oblong and has the abdomen much more closely and coarsely punctured.

25. *Baris corrusca*.

Baridius corruscus, Boh. in Schönh. Gen. Curc. viii. 1, p. 140¹.

Hab. MEXICO¹ (*Mus. Brit.*), "Sierra de Durango" (*Höge*, in coll. *Solari*), Guanajuato (*Sallé*), Yucatan (*Mus. Brit.*).

This insect is only separable from *B. ærea* by its rather more elongate form, the more closely punctured prothorax (except along the median line) and elytra, and the larger and more conspicuous setiform scales on the interstices of the latter. The specimens from Guanajuato seem to belong to a distinct species, while on the other hand many of those from Guatemala city here referred to *B. ærea* are more or less intermediate.

26. *Baris ærea*. (Tab. XXII. figg. 22, 22 a, ♂.)

Baridius æreus, Boh. in Schönh. Gen. Curc. viii. 1, p. 141¹.

Baris ærea, Lec. Proc. Am. Phil. Soc. xv. p. 293²; Casey, Ann. N. York Acad. Sci. vi. pp. 474, 504³.

Baris nicaraguensis, Solari, Ann. Mus. Genova, xlii. p. 420 (1906)⁴.

♂. The metasternum and first ventral segment more or less excavate in the middle, the fifth segment with a slight prominence at the middle of the apical margin.

Hab. NORTH AMERICA, N. Carolina¹, Southern States², Louisiana and Texas³.—MEXICO; BRITISH HONDURAS; GUATEMALA; NICARAGUA⁴; COSTA RICA; PANAMA, Chiriqui, Taboga I.—ANTILLES, Grenada and St. Vincent.

Like *Pseudobaris undulata*, a common insect throughout Central America, extending northward into the Southern United States and southward to the Lesser Antilles, and doubtless into Colombia, &c. Very long series of specimens have been obtained at

Guatemala city, Teapa, Atoyac, Higuito (Costa Rica), St. Vincent, &c., and these seem all referable to one variable species, with which *B. corrusca*, Boh., *B. confinis*, Lec., and *B. managuensis*, Solari, may have to be included. *B. ærea* is chiefly distinguishable by its small size, ovate or oblong-ovate shape, æneous, shining surface, and very short, stout, comparatively smooth rostrum; the elytral interstices are finely seriate-punctate, the ninth raised towards the apex, the small setiform scales varying in size, and sometimes very minute or even wanting; and the legs and rostrum are often reddish. The rostrum varies in length, and the prothorax is often more rounded at the sides in the female than in the male. I have seen the types of *B. corrusca*, *B. nicaraguensis*, and *B. managuensis*, as well as various examples of *B. ærea* from Texas. The Costa Rican examples sent by Biolley, like those of *B. setosella* from the same locality (Higuito), were labelled as having been found on a Composite plant, *Calea axillaris* *. Two closely related S.-American forms have been described by Kirsch, the types of both of which have also been examined †.

27. *Baris managuensis*.

Baris managuensis, Solari, Ann. Mus. Genova, xlii. p. 419 (1906) ¹.

Hab. NICARAGUA, Tipitapa, Lake of Nicaragua (*Solari* ¹).

Described from a single example, kindly communicated by Signor Solari. This is a form of *B. ærea* with the prothorax closely, coarsely punctate, and the elytral interstices somewhat coarsely uniseriate-punctate, the punctures each bearing a very minute scale. Some of our specimens from Guatemala city and Chilpancingo approach it very closely.

28. *Baris setosella*.

Baris setosella, Solari, Ann. Mus. Genova, xlii. p. 418 (1906) ¹.

Hab. MEXICO (*Truqui*, in *Mus. Brit.*), Atoyac (*H. H. Smith*), Motzorongo (*Osborn*, in *U.S. Nat. Mus.*); GUATEMALA, San Gerónimo (*Champion*); NICARAGUA, Managua (*Solari* ¹); COSTA RICA, Higuito (*Biolley*).

This is a form of *B. ærea* with the prothorax and elytral interstices densely punctured, the punctures on the elytra conspicuously setulose, the prothorax with a more or less distinct smooth median line. The second elytral interstice is confusedly punctured in the type and in several of the twelve specimens here referred to the same species.

* Biol. Centr.-Am., Botany, ii. p. 205.

† *B. erubescens*, Kirsch, from Bogota, is a little more elongate than *B. ærea*, and has a slightly longer and stouter rostrum, a more convex prothorax, and deeply striate elytra, with the interstices coarsely uniseriate-punctate. *B. ænescens*, Kirsch, from Peru, has scattered very minute punctures along the elytral interstices.

29. **Baris punctirostris**, sp. n.

Oblong-ovate, very finely alutaceous, moderately shining, æneous, the tibiae sometimes reddish; the punctures at the sides of the prothorax, along the elytral interstices, and on the under surface and legs each bearing a very small, setiform scale. Head closely, minutely punctate, transversely grooved between the eyes; rostrum very short, stout, arcuate, closely punctate to the tip in both sexes. Prothorax transverse, gradually narrowing from the base, constricted in front; densely punctate, except along the smooth median line. Scutellum small, rounded, concave. Elytra sharply, narrowly striate, the striae feebly punctate, the first deeply impressed from a little below the base, the interstices broad, flat, closely uniseriate-punctate, the third, and sometimes the second also, confusedly punctured, the ninth raised towards the apex. Beneath closely punctate; metasternum and first ventral segment hollowed in the middle in the ♂. Tibiae almost straight.

Length $3-3\frac{1}{5}$, breadth $1\frac{1}{3}-1\frac{1}{2}$ millim. (♂ ♀.)

Hab. GUATEMALA, Quezaltenango 7800 feet (*Champion*).

Three specimens. An oblong, æneous form very near *B. area*, with a closely punctured rostrum, a densely punctured prothorax (except along the sharply-defined median line), and closely seriate-punctate, finely setulose elytra. More elongate than *B. setosella*, the elytral interstices less densely and not so coarsely punctate. More closely punctate above (the rostrum included) than *B. corrusca*, the elytral vestiture conspicuous.

30. **Baris seriatosetosa**. (Tab. XXII. figg. 23, 23 a, ♂.)

Baris seriatosetosa, Solari, Ann. Mus. Genova, xlii. p. 419 (1906) ¹.

Hab. MEXICO, "Sierra de Durango" ¹.

A small, oblong-ovate, somewhat depressed form, æneo-piceous in colour, with an extremely short rostrum, a densely punctured prothorax (without trace of smooth median line), a minute, subquadrate, smooth scutellum, and closely, finely uniseriate-punctate elytral interstices, the punctures on the elytra each bearing a small, conspicuous, setiform scale. *B. seriatosetosa* comes very near some of the varieties of *B. area*.

31. **Baris macraspis**, sp. n. (Tab. XXII. figg. 24, 24 a, ♀.)

Subovate, shining, piceous, with a faint æneous tinge; glabrous above, the punctures on the under surface and legs each bearing a minute scale. Head very sparsely, minutely punctate, transversely grooved between the eyes; rostrum stout, strongly arcuate, shorter than the prothorax, flattened at the tip, sparsely, minutely punctate. Prothorax transverse, compressed at the sides in front, sparsely, somewhat finely punctate. Scutellum narrowed posteriorly, oblong, small, flattened. Elytra a little wider than the prothorax, rounded-subtriangular, depressed along the suture, narrowly striate, the interstices very broad, flat, each with a row of extremely minute scattered punctures, the ninth raised towards the apex. Beneath closely, the abdomen sparsely and finely, punctate. Prosternum slightly depressed along the middle to near the base. Tibiae straight.

Length $3\frac{1}{2}$, breadth $1\frac{1}{5}$ millim. (♀.)

Hab. GUATEMALA, Dueñas (*Champion*).

One specimen. A subovate form, with a sparsely punctured prothorax, very broad,

minutely uniseriate-punctate elytral interstices, an oblong, smooth scutellum, and a slightly hollowed prosternum. Not unlike *B. ænescens*, Kirsch, from Peru, but much larger, the prothorax straighter at the sides, less transverse, and more sparsely punctured, the scutellum longer, &c.

32. *Baris quadratipennis*, sp. n. (Tab. XXII. figg. 25, 25 a, ♀.)

Oblong, flattened above, shining, black; the elytral interstices each with a row of widely scattered fine whitish setæ, the punctures on the under surface and legs each bearing a minute scale. Head very sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum strongly arcuate, stout, about as long as the prothorax, sparsely, finely punctate. Prothorax transverse, rounded at the sides anteriorly, strongly constricted in front; sparsely, irregularly, and somewhat finely punctate, except along the smooth median line. Scutellum small, widened posteriorly, subtriangular, canaliculate. Elytra rather elongate, considerably wider than the prothorax, nearly as broad at the middle as at the shoulders, the latter not prominent, the disc feebly transversely depressed at and below the base; with narrow faintly punctured striæ, the interstices broad, flat, each with an irregular row of fine scattered punctures. Beneath sparsely punctate. Prosternum sulcate anteriorly, the sulcus terminating in two oblong foveæ in front. Tibiæ straight, neither dilated nor toothed at the outer apical angle. Length $4\frac{1}{4}$, breadth 2 millim. (♀.)

Hab. PANAMA, Bugaba (*Champion*).

One specimen. An oblong form, with comparatively long, broad, subparallel elytra, the interstices of which are each set with a row of fine scattered setæ, a tubulate prothorax, a subtriangular scutellum, a sulcate prosternum, a shining basal joint to the antennal club, and straight tibiæ. This species and *B. prodita* approach *Pseudobaris* in the form of the prosternum, but they have the basal joint of the antennal club shining and sparsely pilose.

33. *Baris prodita*, sp. n. (Tab. XXII. figg. 26, 26 a, ♂.)

Oblong, shining, black; the elytral interstices each with a row of scattered, fine, stiff, decumbent setæ, the punctures on the under surface and legs each bearing a minute scale. Head sparsely, minutely punctate, deeply, transversely grooved between the eyes; rostrum very stout, short, not so long as the prothorax, strongly arcuate, almost straight beneath (as seen in profile, fig. 26 a), with scattered minute punctures. Prothorax rather convex, transverse, rounded at the sides anteriorly, strongly constricted in front; coarsely, closely punctate, except along the smooth median line. Scutellum large, subquadrate, rugose. Elytra oblong, a little wider than the prothorax; sharply, narrowly punctate-striate, the interstices broad, flat, each with a row of scattered minute punctures. Beneath closely, the abdomen sparsely and finely, punctate; first ventral segment flattened down the middle in the ♂. Prosternum shallowly sulcate, the groove limited on each side anteriorly by a feeble oblique ridge. Tibiæ almost straight.

Length $3-3\frac{1}{2}$, breadth $1\frac{2}{5}-1\frac{1}{2}$ millim. (♂.)

Hab. MEXICO (*ex coll. Flohr*), Acapulco (*Höge*).

Two specimens. Smaller than *B. quadratipennis*; the rostrum very stout, shorter, strongly arcuate above and broadly flattened beneath (when viewed in profile); the prosternal depression shallower and widened forwards; the elytral setæ more numerous; the scutellum larger.

34. *Baris rubicundula*, sp. n. (Tab. XXII. figg. 27, 27 a.)

Oblong, narrow, convex, shining, piceous, the elytra and legs rufescent; almost glabrous above, the punctures at the sides of the prothorax and on the under surface and legs each bearing a very minute scale. Head sparsely, minutely punctate, with a smooth, shallow, transverse groove between the eyes; rostrum curved, very stout, about as long as the prothorax, slightly widened towards the tip, sparsely, finely punctate. Prothorax transverse, distinctly narrowed behind, the sides gradually and obliquely converging forwards to the constricted apical portion; closely punctate, with indications of a smooth median line. Scutellum small, transverse. Elytra a little wider than the prothorax, subparallel in their basal half and arcuately narrowing thence to the apex, the humeri obtuse; sharply and narrowly punctate-striate, the interstices broad and flat on the disc, narrowly costate at the apex, each with a row of extremely minute scattered punctures. Pygidium short, vertical. Beneath closely, the abdomen more sparsely and finely, punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ rather small, separated by a little more than their own width. Legs short; tibiæ almost straight, the anterior pair with a short tooth at the inner apical angle; tarsal claws very small, free.

Length $2\frac{1}{2}$, breadth $1\frac{1}{10}$ millim. (♀ ?)

Hab BRITISH HONDURAS, Rio Hondo (*Blancaneaux*).

One specimen. A small, narrow, convex, rufescent form, with the upper surface polished and almost glabrous, the prothorax distinctly narrowed at the base, the elytral interstices narrowly costate at the apex, the pygidium very short. It is not closely related to any of the other species here described, and bears a certain resemblance to the N.-American *Plesiobaris albilatus*, Lec.

BRACHYBARIS.

Brachybaris, Faust, Deutsche ent. Zeitschr. 1886, p. 371.

This genus includes a small, short-ovate, compact, æneo-piceous form, with the prothorax margined at the sides*, and deeply excavate and smooth on the flanks, the rostrum stout and extremely short, the basal joint of the antennal club shining, the eyes very large and almost contiguous beneath, the anterior tibiæ bi-unguiculate in the male (fig. 28 b) and uni-unguiculate in the female, the prosternum shallowly sulcate, the tarsal claws minute and free, the pygidium very large and oblique in the male, smaller, transverse, and convex in the female.

1. *Brachybaris mutila*. (Tab. XXII. figg. 28, 28 a, b, ♂.)

Baridius mutilus, Boh. in Schönh. Gen. Curc. viii. 1, p. 149¹.

Brachybaris mexicanus, Faust, Deutsche ent. Zeitschr. 1886, p. 372².

Hab. MEXICO² (*Truqui*, in *Mus. Brit.*), Ventanas in Durango (*Höge*: ♂ ♀); BRITISH HONDURAS, Rio Hondo (*Blancaneaux*); NICARAGUA, Chinandega (*Baker*: ♂ ♀).—COLOMBIA¹.

We have received six examples of this species, agreeing with the types of Boheman

* *Baridius thoracicus*, Kirsch, from Peru, has a somewhat similarly margined prothorax, but in that insect the pygidium is covered by the elytra, &c.; it will probably have to form the type of a new genus of "Centrinides."

and Faust, both of which I have examined. There is a specimen of it in the British Museum labelled as from "California," and doing duty for *Baridius californicus*, Motsch. *.

BRACHYBARIDIUS, gen. nov.

Rostrum very stout, strongly arcuate, the scrobes descending towards the base and continued forwards to near the tip, the antennæ inserted at about the basal third, the joints 2-7 of the funiculus short and closely articulated, the club oblong-ovate and pubescent; eyes transverse; prothorax with the base oblique and feebly sinuate on each side of the short, truncate, median lobe; scutellum rounded, free, flat, on a level with the surrounding surface; elytra rounded-triangular, the sides forming an almost continuous outline with those of the prothorax, the apices separately rounded; pygidium exposed, declivous, convex; presternum shallowly sulcate, the basal process flattened, truncate behind, leaving the mesosternum narrowly exposed; anterior coxæ deeply inserted, rather small, separated by about their own width; ventral segments 1 and 2 connate; legs very short; femora stout, compressed, shallowly sulcate, unarmed; tibiæ flattened, uni-unguiculate; tarsal claws minute, connate at the base; body short-ovate, convex, compact, glabrous above.

Type, *B. immarginatus*.

The single species referred to this genus has exactly the facies of *Brachybaris* (*i. e.* it has the compact form of the N.-American *Pachybaris*, Lec.); but the prothorax is not margined at the sides, the scutellum is larger, and the rostrum, eyes, and antennæ are differently formed. The rostrum is longer, the base of the prothorax is more oblique on each side, and the scutellum more raised, than in the insects here placed under *Baris*. The unique type of *B. immarginatus* is from the Atlantic coast of Guatemala, and belongs to the U.S. National Museum.

1. *Brachybaridius immarginatus*, sp. n. (Tab. XXII. figg. 29, 29 a, ♂.)

♂. Æneo-piceous, shining, the punctures on the under surface and legs each bearing a very minute scale. Head faintly punctulate; rostrum as long as the prothorax, separated from the head by a transverse groove, finely punctate at the base. Prothorax strongly transverse, narrowing from the base, slightly constricted in front; somewhat closely punctate. Elytra shallowly and narrowly crenate-striate, the interstices flat and finely, transversely wrinkled. Beneath very coarsely, the ventral segments 2-5 sparsely and finely, punctate, the first segment hollowed in the middle.

Length $2\frac{2}{5}$, breadth $1\frac{2}{5}$ millim.

Hab. GUATEMALA, Livingston (*Barber & Schwarz, in U.S. Nat. Mus.*).

One male, labelled as having been found on May 9th.

NANOBARIS, gen. nov.

Mandibles short, decussate; rostrum separated from the head by a deep transverse groove, stout, moderately long, strongly arcuate, the antennæ inserted at the middle, the antennal club stout, ovate, and densely pubescent, much wider than the outer joints of the 7-jointed funiculus; prothorax transverse, small, bisinuate at the base; scutellum free, transverse; elytra short, very much wider than the prothorax, rather convex, blunt at the apex, finely striate, setose; pygidium exposed, convex, subvertical; prosternum narrowly sulcate, the basal process short; anterior coxæ separated by nearly their own

* According to Casey (Ann. N. York Acad. vi. p. 683), this species is possibly synonymous with *Centrinus* (*Limnobaris*) *nasutus*, Lec.

width; legs short; femora unarmed, shallowly sulcate; tibiae feebly unguiculate; tarsal claws long, subconnate at the base; body short-ovate.

Type, *N. plumbata*.

A genus including two very small closely-allied forms, distinguishable by their small prothorax, broad, retuse, setose elytra, arcuate, moderately long rostrum, abrupt antennal club, and narrowly sulcate prosternum.

1. *Nanobaris plumbata*, sp. n. (Tab. XXII. figg. 30, 30 a, ♂.)

Lead-en-black, above and beneath opaque and alutaceous; the elytral interstices each with a row of closely-placed, cinereous, semierect setae, the punctures on the rest of the surface each bearing a minute hair-like scale. Head minutely punctate; rostrum very stout, about as long as the head and prothorax, closely, finely punctate. Prothorax much broader than long, the sides parallel behind and rounded anteriorly; densely, very finely punctate. Elytra arcuately narrowing from about the middle, very finely and shallowly punctate-striate, the interstices broad and flat throughout, closely and finely uniseriate-punctate. Beneath finely punctate; fifth ventral segment broadly arcuate-emarginate, leaving the transverse pygidium exposed ventrally, in the ♂. Prosternum shallowly sulcate from the transverso subapical groove to between the coxae.

Length $2-2\frac{1}{10}$, breadth $1-1\frac{1}{10}$ millim. (♂ ♀.)

Hab. MEXICO, Tapachula in Chiapas (*Höge*); PANAMA, Volcan de Chiriqui 3000 feet (*Champion*).

Five specimens, all but one from Chiriqui. Easily recognizable by its lead-en-black, opaque surface and strongly setose elytra.

2. *Nanobaris retusa*, sp. n.

Nigro-piceous, somewhat shining; the elytral interstices each with a row of closely-placed, cinereous, semierect setae, the punctures on the rest of the surface each bearing a minute hair-like scale. Head minutely punctate; rostrum moderately stout, as long as the head and prothorax, very finely punctate. Prothorax densely, finely punctate. Elytra finely punctate-striate, the interstices broad, flat, closely and finely uniseriate-punctate. Beneath closely and finely, the ventral segments 1-4 with the broad shining space down the middle sparsely, punctate. Prosternal sulcus deep and extending forward to the apex.

Length $2\frac{1}{10}-2\frac{2}{5}$, breadth $1\frac{1}{10}-1\frac{1}{5}$ millim. (♀.)

Hab. MEXICO, Cordova (*Knab*, in *U.S. Nat. Mus.*), Teapa (*H. H. Smith*); GUATEMALA, San Juan in Vera Paz (*Champion*).

Three specimens, the one from Cordova a little more shining than the others. This is the Atlantic-slope representative of *N. plumbata*, differing from that insect in its somewhat shining surface, deeper prosternal sulcus, and more distinctly striate elytra.

TYTTHOBARIS, gen. nov.

Mandibles short, decussate; rostrum strongly arcuate, stout, as long as the prothorax, separated from the head by a transverse groove; antennae with a small, oblong-ovate, densely pubescent club, the funiculus 7-jointed and closely articulated; eyes rather small; prothorax narrow, bisinuate at the base; scutellum very small, free, rounded; elytra much wider than the prothorax, oblong, conjointly rounded at the tip; pygidium vertical, very short; prosternum deeply bifoveate near the apex and also narrowly sulcate;

anterior coxæ separated by less than their own width; legs short; femora sulcate, the anterior pair with a broad, deep, subapical excavation limited inwards by a short tooth (fig. 31 b); tibiæ more or less curved, strongly unguiculate; tarsi short, the claws minute, connate at the base; body oblong-ovate, polished and glabrous above.

Type, *T. cavimanus*.

The minute species placed under this genus is related to *Pseudobaris*, but cannot possibly be included in it. The bifoveate, sulcate prosternum, the minute, basally connate tarsal claws, the somewhat bowed tibiæ, the deeply excavate, feebly dentate anterior femora, and the small, oblong-ovate antennal club are its chief characters. *Tytthobaris* approaches *Nanobaris*, but differs from it in the form of the claws, tibiæ, and femora, the narrower antennal club, the bifoveate prosternum, &c. *Microbaris*, Casey, including a single species from Texas, seems to be an allied genus.

1. *Tytthobaris cavimanus*, sp. n. (Tab. XXII. figg. 31, 31 a, b, ♀.)

Black, shining, glabrous above, the punctures on the under surface and legs each having a minute scale. Head minutely punctate; rostrum closely punctate, smoother at the tip. Prothorax rather convex, a little broader than long, gradually narrowing from near the base, feebly constricted in front; closely, coarsely punctate, smoother along the anterior margin. Elytra subparallel in their basal fourth, about twice as long as the prothorax, transversely depressed on the outer part of the disc below the base, the suture depressed anteriorly; very finely punctate-striate, the striæ becoming broader and strongly punctured at the base, the interstices broad, flat, each with a row of very minute scattered punctures. Beneath closely and coarsely, the abdomen very sparsely and finely, punctate. Intermediate tibiæ strongly, the others more feebly, arcuate.

Length $2\frac{1}{10}$, breadth 1 millim. (♀.)

Hab. GUATEMALA, San Juan in Vera Paz (*Champion*).

One specimen, easily recognizable by the coarsely-punctured prothorax, the polished, finely striate elytra, the bowed intermediate tibiæ, and the toothed, broadly excavate, anterior femora, the tooth arising nearer the base than usual amongst the Barids.

CYRTOBARIS, gen. nov.

Rostrum very stout, abruptly bowed from the base, as long as the prothorax, separated from the head by a deep transverse groove; antennæ with a densely pubescent, elongate-ovate club, which is nearly as long as the funiculus, the joints 2-7 of the latter closely articulated, widening outwards, and strongly transverse; prothorax deeply sinuate at the base, the median lobe subtruncate; scutellum small, oblong, free; elytra very broad, short, rounded-triangular, conjointly rounded at the apex; pygidium short, strongly transverse, vertical; prosternum shallowly sulcate, deeply bifoveate anteriorly; anterior coxæ separated by a little less than their own width, flattened within; intermediate coxæ widely separated; legs short, stout; femora compressed, unarmed, sulcate; tibiæ almost straight; tarsi with the third joint broad and bilobed, the fourth slender, the claws minute, subconnate at the base; body short, rhomboid-ovate, subglabrous.

Type, *C. bigibba*.

This genus is perhaps nearest related to *Nanobaris*. It includes a single species, of small size, from Panama.

1. *Cyrtobaris bigibba*, sp. n. (Tab. XXII. figg. 32, 32 a.)

Black, opaque and alutaceous above, the rostrum and abdomen shining; the punctures on the under surface and legs each bearing a very minute scale. Head finely punctate; rostrum (as seen in profile) arcuate above and flattened beneath, strigose-punctate, smoother at the tip, the antennæ inserted at about the basal third. Prothorax much broader than long, conical, transversely gibbous at the middle of the disc; densely punctate. Elytra compressed at the sides anteriorly and rapidly narrowing thence to the broadly-rounded apex, transversely gibbous below the base; finely punctate-striate, the striæ becoming broader and more coarsely punctured anteriorly, the interstices broad, flat, narrowed towards the base, transversely rugulose, and faintly uniseriate-punctate. Beneath finely punctate.

Length 2, breadth $1\frac{1}{2}$ millim. (♂?)

Hab. PANAMA, Bugaba (*Champion*).

One specimen.

LITOBARIS, gen. nov.

Mandibles short, decussate; rostrum abruptly bowed from the base, separated from the head by a transverse groove, moderately long; antennal club acuminate-ovate, densely pubescent; prothorax feebly bisinuate at the base, the median lobe short; scutellum very small, rounded, free; elytra somewhat oval, conjointly rounded at the apex; pygidium very short, inflexed, ventrally exposed; prosternum slightly depressed down the middle, without definite sulcus; anterior coxæ separated by less than their own width; legs short; femora unarmed; tibiæ almost straight, feebly unguiculate; tarsi with the third joint narrowly bilobed, the claws connate at the base; body oblong, narrow, convex, sparsely clothed with minute scales.

Type, *L. subpruinosa*.

This genus is based upon a Mexican insect nearly related to *Pseudobaris*, with a short, inflexed, ventrally exposed pygidium, basally connate claws, an indefinitely grooved prosternum, and a feebly-lobed prothorax. *Litobaris* has very much the facies of *Limnobaris confusa* and its allies, from which it is readily separated by the exposed pygidium. *Trepobaris* has a similarly shaped prothorax, but differs in the form of the scutellum, &c.

1. *Litobaris subpruinosa*, sp. n. (Tab. XXII. figg. 33, 33 a, b, ♂.)

Shining, nigro-piceous, the legs rufescent; the punctures on the prothorax, elytral interstices, under surface, and legs each bearing a minute scale. Head closely, finely punctate; rostrum moderately stout, a little longer than the prothorax, closely punctate at the sides, smooth along the centre above, the antennæ inserted at about the middle. Prothorax transverse, gradually narrowing from near the base, feebly constricted in front; densely punctate, with indications of a smooth median line. Elytra a little wider than the prothorax, subparallel at the base, the humeri obtuse; shallowly punctate-striate (the punctures closely placed towards the base), the interstices broad, flat, the second and third confusedly, and the others densely and uniseriately punctate, the interstitial punctures rounded and coarser than those of the striæ. Beneath closely punctate; first ventral segment flattened down the middle, the fifth almost on the same plane as the short ventrally-exposed pygidium. Femora and tibiæ rugulose punctured.

Length $2\frac{5}{8}$, breadth $1\frac{1}{4}$ millim. (♂.)

Hab. MEXICO, "Sierra de Durango" (*Höge, ex coll. Solari*).

One specimen. The elytral striæ in this insect are narrow and shallow, and the interstices are densely and rather coarsely seriate-punctate.

OLIGOBARIS, gen. nov.

Mandibles long, notched within, decussate at the tip, oblique on their outer edge; rostrum long, stout, arcuate, separated from the head by a transverse sulcus; antennæ (fig. 34 *a**) with a stout, oblong-ovate, acuminate, densely pubescent club, which is about as long as the funiculus, the latter with joints 2-7 widening outwards and strongly transverse; eyes very large; prothorax broad, subtubulate in front, deeply bisinuate at the base, the median lobe rounded, impinging on the scutellum, and margined behind, the exposed portion of the latter arcuate and strongly transverse; elytra suboval; pygidium very large, convex, vertical, truncating the fifth ventral segment beneath; prosternum completely unimpressed behind the transverse subapical groove; anterior coxæ separated by about their own width; legs rather elongate; femora feebly clavate, sulcate, unarmed; tibiæ almost straight, with a slender apical uncus; tarsi with the third joint narrowly bilobed, the claws long and divergent; body oblong-ovate, densely squamose beneath, setulose above.

Type, *O. breviscutum*.

This genus includes a single small species from Panama. Its essential characters are:—the unimpressed prosternum, the incompletely exposed, broad, arcuate scutellum, the stout, elongate antennal club, the comparatively long, apically decussate mandibles, the very large, convex pygidium, and the long, divergent tarsal claws. *Oligobaris* has more the facies of a Centrinid than of a true Barid.

1. *Oligobaris breviscutum*, sp. n. (Tab. XXII. figg. 34, 34 *a*, *b*, ♂.)

Rather convex, shining, the tarsi and antennæ ferruginous or fuseo-ferruginous; the sides of the prothorax and the elytra clothed with very small, white, setiform, adpressed scales, those on the elytra arranged in a single close series down each interstice, the series becoming doubled or trebled towards the base of 2-4; the under surface densely clothed with larger, oblong, white scales. Head densely, finely punctate; rostrum fully as long as the head and prothorax, densely punctured, the antennæ inserted at a little below the middle. Prothorax strongly transverse, rounded at the sides anteriorly, strongly constricted in front; closely punctate, except along the smooth median line. Elytra very little wider than the prothorax, gradually narrowing from the base, depressed along the suture; finely and shallowly punctate-striate, the interstices broad, flat, closely, transversely rugose and feebly seriate-punctate. Beneath densely punctate.

Length $2\frac{2}{5}$, breadth $1\frac{1}{10}$ — $1\frac{1}{8}$ millim. (♂.)

Hab. PANAMA, David in Chiriqui (*Champion*).

Two specimens, evidently males. The vestiture of the under surface in this insect is denser and coarser beneath, as in many Centrinids.

* Numbered 34 *b* at the bottom of the Plate.

S U P P L E M E N T.

DURING the course of publication of the preceding pages of this volume the numerous Mexican and Central-American Barids belonging to the U.S. National Museum at Washington have been submitted to me for examination, most of these, fortunately, having been received in time to be included in their proper place. Mr. H. F. Wickham, too, has forwarded the material in this group obtained by him in Mexico during the past year, allowing us to retain such forms as were required. His consignment has added a considerable number of species and three genera (*Orthoris*, *Leptoschœnus* *, and a new one related to *Centrinites*) to our long list of Barids †. Of the ten species of this group found by Mr. H. H. Smith in the Antillean islands of St. Vincent and Grenada, three have already been incidentally noticed (*anteà*, pp. 252, 274, 379); the rest of them are noted in the text or described in footnotes in this Supplement.

ZYGOPINA.

CYLINDROCOPTURUS (p. 35).

Cylindrocopturus scaphiformis (p. 41).

To the Mexican localities given, add:—Gonzales (*Wickham*).

COPTURUS (p. 69).

1 (A). **Copturus fausti**. (Tab. XXIII. figg. 7, 7 a, ♂.)

Copturus (*Macrocopturus*) *fausti*, Heller, Abhandl. Mus. Dresden, no. 11, p. 24¹.

Hab. COSTA RICA (*Biolley, ex coll. Solari*).—PERU¹, Chamicuros (*Mus. Brit.*).

Signor Solari has sent us a specimen (♂) of this species labelled as from Costa Rica. It is a large, robust form allied to *C. martæ*, with the upper surface shining and marked with numerous, sharply defined, albo-squamose spots—five or six on the prothorax and about sixteen on the elytra (including two common larger patches on the suture); the elytra closely seriato-foveolate, and mucronate at the apex; the under surface densely albo-squamose; the first ventral segment broadly depressed down the middle in the male.

* Hitherto recorded as doubtfully Mexican (*cf. anteà*, p. 329).

† It may be noted here that *Oligopus pellitus*, Kirsch (Deutsche ent. Zeitschr. 1875, p. 279), from Peru, described as a Cossonid, the type of which I have recently examined, is a true Barid, with an exposed pygidium, allied to *Pithecomus*, Pasc., and *Glyptobaris*, Casey.

Copturus fulvocruciatus (p. 82).

To the localities given, add:—NICARAGUA, Managua (*Solari*).

25 (A). **Copturus cribricollis**, sp. n. (Tab. XXIII. figg. 8, 8 a.)

Elliptic, nigro-piceous; variegated with scattered patches of small, narrow, cinereous scales, the scales on the prothorax clustered into various coalescent irregular markings at the sides, a large spot in the middle at the base, and a small one in a line with it at the apex, those on the elytra condensed into a posteriorly interrupted sutural stripe, a broad common transverse patch at the base, a narrower one just beyond the middle, two much interrupted fasciæ in a line with these externally, and a small patch on the margin near the apex; the vestiture of the under surface much coarser, whitish, that of the legs rather fine, close, and whitish, the posterior femora with a bare space near the apex. Eyes very large, narrowly separated. Rostrum shorter than the head and prothorax, rugulose and carinate at the base. Second joint of the funiculus very elongate, nearly as long as 3-6 united. Prothorax short, coarsely, densely punctate. Elytra much wider than the prothorax, somewhat rounded at the sides, separately rounded at the apex; rather coarsely punctate-striate, the interstices densely, transversely rugose, becoming convex towards the sides. Meso- and metasternum slightly depressed between the middle coxæ. Legs short; femora sharply unidentate.

Length $3\frac{4}{5}$, breadth $1\frac{2}{10}$ millim.

Hab. COSTA RICA, Higuito, Pacific slope (*Biolley*).

One specimen. Near *C. ludiosus*, but with the vestiture finer, the markings of the prothorax and elytra uniformly cinereous, the sutural stripe interrupted near the apex only, the two common transverse patches sharply defined, the rostrum shorter. The coarsely punctured prothorax and elytral striæ, the annulate posterior femora, &c., separate *C. cribricollis* from *C. multiguttatus*.

LECHRIOPS (p. 91).

9 (A). **Lechriops erythrorrhynchus**, sp. n. (Tab. XXIII. figg. 9, 9 a, 10.)

Subovate, black, the prothorax and the femora in part piceous, the rostrum and antennæ ferruginous, the tarsi fusco-ferruginous; the vestiture fine, yellowish-white, intermixed with black on the elytra, that on the prothorax condensed into three interrupted vittæ, the pallid scales on the elytra condensed into an interrupted sutural stripe, which becomes denser and whiter on an oblong space just beyond the middle, and numerous streaks and spots, the posterior femora with a bare annulus towards the apex; the under surface densely and uniformly clothed with yellowish-white scales. Eyes very large, narrowly separated. Rostrum shining, rugulose punctate and carinate at the base. Joint 2 of the funiculus elongate, nearly as long as 3-6 united, 3 and 4 equal in length. Prothorax short, narrowing from the base, densely, rather coarsely punctate. Elytra broadly subcordate, blunt at the apex, depressed along the suture at the base; finely punctate-striate, the interstices densely rugulose. Rostral canal extending to the front of the metasternum. Legs short; femora sharply dentate; intermediate and posterior knees dentate.

Length $3\frac{1}{2}$ – $3\frac{2}{3}$, breadth 2 millim.

Hab. NICARAGUA, Managua (*Solari*).

Two specimens, kindly presented by Signor Solari. The elytral markings are variable, one example having the interstices 2-4 streaked (like the suture) with yellowish-white scales and the spots on the disc more extended than in the other. Near *L. rufomaculatus*, but not very closely related to that or any other species described in this work.

Lechriops festivus (p. 107).

To the localities given, add :—NICARAGUA, Managua (*Solari*).

Specimens of this species, and of *L. infimus*, Boh., have been sent us by Signor Solari from Managua.

PHILIDES (p. 129).

2. Philides comans, sp. n. (Tab. XXIII. figg. 11, 11 *a*, *b*, ♂.)

Larger, broader, and more robust than *P. anthonomoides*; the erect bristly vestiture longer, coarser, and whiter, the imbricate white hairs along the suture more numerous; the pectinate white scales at the base of the prothorax confined to a narrower space, but extending forward along the middle of the disc to the anterior margin and backward along the basal portion of the suture; the rostrum much stouter, thickly clothed with white hairs to the tip, closely punctate and finely carinate, the antennæ inserted at a little beyond the middle, joint 2 of the funiculus slightly longer than 3; the legs stouter and more hairy; the prothorax more convex, less densely and more coarsely punctate, the narrow interspaces shining; the elytra with broader and deeper striæ and broader interstices, the latter with a scattered series of rather coarse transverse setigerous impressions and minute irregularly distributed punctures; metasternum with a polished, deep, rounded excavation in the middle at the apex; ventral segments 1–4 sparsely squamose down the centre, 2 widened at the middle and somewhat raised posteriorly, 3 and 4 appearing depressed to near the sides, 5 unimpressed at the apex*.

Length 3, breadth $1\frac{1}{2}$ millim. (♂.)

Hab. MEXICO, "Sierra de Durango" (*Höge, ex coll. Solari*).

Two specimens. It is not impossible that this Mexican insect may be the male of the Panama *P. anthonomoides*, and that the type of the latter is a female; but the differences are too numerous to be purely sexual.

BARINA.

AMBATES (p. 155).

Ambates cretifer, var. (p. 156).

To the localities given, add :—COSTA RICA, Guapiles (*Schaus, in U.S. Nat. Mus.*).

A second specimen of the variety has now been seen.

5 (A). Ambates isthmicola, sp. n. (Tab. XXIII. figg. 12, 12 *a*, ♂.)

Elongate-ovate, flattened above, piceous, the antennæ (the club excepted) and legs (the apices of the femora excepted) rufo-testaceous, the rostrum rufous in one specimen; above and beneath densely clothed with small scales, the head on each side between the eyes, the prothorax and elytra each with a broad submarginal vitta, which is constricted near the apex, the former also with an abbreviated median line and the latter with some scattered patches along the striæ, sulphur-yellow, the rest of the vestiture of the upper surface blackish, that of the under surface coarser and denser and uniformly yellowish-white; the

* The unique type of *P. anthonomoides* has a transverse almost bare depression at the apex of the fifth segment, not mentioned in the description.

legs sparsely squamose. Head densely punctate, feebly foveate between the eyes; rostrum curved, moderately stout, about as long as the head and prothorax, shining, very sparsely, finely punctate, rugulosely punctured laterally at the base. Prothorax transverse, arcuately narrowing from the base, strongly constricted in front; densely, finely punctate. Elytra transversely depressed on the disc below the base, finely punctate-striate, the interstices densely, rugulosely punctate. Beneath densely punctate; first ventral segment broadly and shallowly depressed down the middle, the fifth with a smooth shallow fovea near the apex.

Length $7\frac{1}{10}$ – $7\frac{1}{4}$, breadth $2\frac{9}{10}$ –3 millim. (♂.)

Hab. PANAMA, Tabernilla, Canal Zone (*Busck, in U.S. Nat. Mus.*).

Two specimens. Near *A. leucopleura* and *A. latevittatus*, but differing from both of them in the uniformly squamose under surface, the broad sulphur-yellow submarginal stripe, the transversely depressed elytra, and the comparatively smooth rostrum and shallowly sulcate first ventral segment.

Ambates sinuatus (p. 159).

To the locality given, add:—COSTA RICA, Tucurrique (*U.S. Nat. Mus.*).

Ambates biguttatus (p. 164).

To the localities given, add:—GUATEMALA, Trece Aguas in Alta Vera Paz (*Barber & Schwarz, in U.S. Nat. Mus.*).

Ambates solani (p. 166).

To the localities given, add:—GUATEMALA, Trece Aguas (*Barber & Schwarz, in U.S. Nat. Mus.*); COSTA RICA, San Carlos, Turrialba, Tucurrique (*U.S. Nat. Mus.*).

Ambates scutiger (p. 167).

To the Guatemalan locality given, add:—Trece Aguas (*Barber & Schwarz, in U.S. Nat. Mus.*: ♂).

Described from a single female from the opposite side of the Polochic Valley. The male has the rostrum closely punctured and squamose to near the tip, the antennæ inserted nearer the apex, and the first ventral segment slightly depressed down the middle. The vestiture is precisely similar in colour in the two specimens. An allied form occurs in the Lesser Antilles*.

* **Ambates lateralis**, sp. n.

Elongate, opaque, piecous, the antennæ (the club excepted) and tarsi ferruginous; thickly clothed with intermixed fulvous and brown scales, and also with a few small scattered white spots along the elytral striæ, and some larger ones on the sides of the body beneath and on the outer face of the posterior femora; the prothorax with the sides (leaving a large triangular dark space on the disc), flanks, and under surface (a transverse patch opposite the eyes excepted) almost wholly white, and the elytra with an irregular, oblique or subtriangular, dark velvety patch on the inner part of the disc before the middle; the vestiture of the head, and that of the rest of the under surface and legs, fulvous slightly intermixed with white, the tarsi with ochreous hairs. Head densely punctate, depressed and faintly sulcate between

Ambates albiventris (p. 169).

To the Costa Rican locality given, add:—Turrialba, San Carlos (*U.S. Nat. Mus.*).

Two males and two females. In fresh specimens the elytra have numerous, small, more or less distinct patches of yellowish-white scales along the striae. The meso-sternal side-pieces and the sides of the first ventral segment are apparently always bare or sparsely squamose (so that the oblique lateral yellowish-white patch on the elytra may be said to be continued broadly downwards on to the metasternum). The rostrum of the female is a little longer and more slender than in the male, and almost smooth from about the basal third. Described from a single somewhat worn male.

34. Ambates chætopus, sp. n. (Tab. XXIII. figg. 13, 13 *a*, ♂.)

Elongate-rhomboidal, rather broad, flattened above, black, the antennæ (the club excepted) and the tip of the rostrum rufous, the tarsi rufo-testaceous; above somewhat thickly clothed with small blackish, yellowish-white, and ochreous scales, the ochreous scales condensed into a narrow, oblique, evanescent, submarginal vitta or line on the prothorax, which is continued forward on to the sides of the head, and an elongate-triangular patch at the apex of each elytron, the paler scales clustered into numerous small irregular spots along the striae; the vestiture of the under surface ochreous or pale ochreous, very dense, sparser along the middle of the metasternum and abdomen; the tarsi strongly fulvo-setose in both sexes. Head rugulosely punctate; rostrum feebly curved, rather slender, considerably longer than the head and prothorax, very sparsely, finely punctate, in the ♀ more elongate, slender, and almost smooth from about the basal fourth, the antennæ inserted far behind the middle in both sexes. Prothorax transverse, conical, constricted in front; densely, finely, confluent punctate, with a smooth, raised median line anteriorly. Elytra elongate-triangular, much wider than the prothorax; finely punctate-striate, the interstices densely, rugulosely punctate, the ninth narrowly costate for some distance below the base. Beneath densely punctate.

♂. Ventral segments 1 and 2 broadly hollowed, smoother, and sparsely squamose down the middle; tarsi slightly dilated and densely clothed with long, fulvous, bristly hairs; anterior tibiae fulvo-ciliate at the apex within.

Length $9\frac{1}{2}$ –10, breadth 4 – $4\frac{1}{4}$ millim. (♂ ♀.)

Hab. COSTA RICA, Carrillo, San Carlos (*U.S. Nat. Mus.*).

the eyes; rostrum moderately stout, curved, a little longer than the head and prothorax, densely punctate and finely carinate in its basal half, and sparsely punctate and shining thence to the tip, in the ♀ slightly smoother, the antennæ slender and inserted at about the middle. Prothorax strongly transverse, constricted and arcuately narrowed in front; densely, finely punctate, and sometimes with indications of a raised median line. Elytra much wider than the prothorax, elongate-triangular, obliquely depressed on the disc below the base, and with prominent subapical callosities; finely punctate-striate, the interstices flat and densely, finely punctate. Beneath densely punctate, the ventral segments 3 and 4 with a smoother space in the middle. Femora sharply dentate. Length $7\frac{1}{2}$ –8, breadth $3\frac{1}{5}$ – $3\frac{1}{2}$ millim.

Hab. SR. VINCENT, Windward side, 1000 feet (*H. H. Smith*).

Five specimens, found on foliage, one with intermixed fulvous and white scales on the sides of the prothorax (? somewhat abraded). Larger and broader than *A. scutiger*, the sides of the prothorax white, the dark patch on the elytra placed nearer the base, the rostrum and antennæ more slender, &c. More elongate than *A. ornativentris*, the vestiture differently coloured.

One pair, the male from Carrillo captured by Mr. Lankester. This species is not closely related to any of those described in this work, and it is remarkable on account of the fulvo-setose tarsi and the long slender rostrum in both sexes. The oblique submarginal vitta on the prothorax is almost obsolete in one specimen (♂).

PROCHOLUS.

Pseudocholus, Desbrochers, Ann. Soc. Ent. Belg. l. p. 366 (1906) (nec Lacord.).

Procholus, Desbrochers, op. cit. li. p. 7 (Jan. 1907).

Pseudambates, Champion, anteà, p. 171 (Feb. 1907); Ann. Soc. Ent. Belg. lii. p. 112.

Sphalerocholus, Heller, Deutsche ent. Zeitschr. 1908, p. 59.

1. *Procholus biplagiatus*.

Pseudambates biplagiatus, anteà, p. 171, t. 9. figg. 10, 10 a.

To the Costa Rican localities given, add:—Guapiles (*Schaus, in U.S. Nat. Mus.*).

PERIDINETUS (p. 171).

Peridinetus canus (p. 172).

To the localities given, add:—COSTA RICA, Piedras Negras (*U.S. Nat. Mus.*).

Peridinetus cretaceus (p. 173).

To the localities given, add:—COSTA RICA, Puerto Limon, Turrialba, Carrillo (*U.S. Nat. Mus.*).

Peridinetus irroratus (p. 175).

To the localities given, add:—COSTA RICA, Banana River, Zeut, San Carlos (*U.S. Nat. Mus.*); PANAMA, Lion Hill (*Busck, in U.S. Nat. Mus.*).

CYRIONYX (p. 188).

Cyrionyx camelus (p. 195).

To the localities given, add:—COSTA RICA, Esparta (*Knab, in U.S. Nat. Mus.*).

26 (A). *Cyrionyx albovarius*, sp. n.

Subrhomboidal, piceous, the antennæ, tip of the rostrum, and legs obscure ferruginous; variegated above with a somewhat dense clothing of dull purplish-brown and white scales, the white scales on the prothorax condensed into a broad, oblique, sinuous vitta on each side, and those on the elytra into numerous scattered patches, one on the fourth interstices before the middle being the most conspicuous; the under surface and legs albo-squamose. Head densely punctate and squamose; rostrum curved, a little longer than the head and prothorax, rather slender, thickened, rugulosely punctate, and subcarinate towards the base, the antennæ inserted at the middle. Prothorax short, narrowing from near the base, feebly

constricted in front; densely, finely punctate. Elytra much wider than the prothorax, triangular, rather convex; finely punctate-striate, the interstices almost flat, densely punctate. Femora unidentate. Tarsal claws minute, free.

Length 2, breadth $1\frac{1}{6}$ millim.

Hab. GUATEMALA, Trece Aguas in Alta Vera Paz (*Barber & Schwarz, in U.S. Nat. Mus.*).

One specimen, in good condition; a worn example from the same locality, with the white scales much less numerous, and not clustered into definite markings, probably belonging to the same species. Near *C. alboplagiatus*, but with the white markings less sharply defined and differently placed (there being no trace of a spot on the second elytral interstice below the base), the purplish-brown scales larger and more numerous*. The scales are smaller and less rounded on the elytra than in the variable *C. nebulosus*.

Cyrionyx nebulosus (p. 204).

To the localities given, add:—GUATEMALA, Trece Aguas in Alta Vera Paz (*Barber & Schwarz, in U.S. Nat. Mus.*).

DIORYMERUS (p. 211).

Diorymerus serripes (p. 213).

To the localities given, add:—COSTA RICA, Piedras Negras (*U.S. Nat. Mus.*).

* The following is another allied form from the Lesser Antilles:—

Cyrionyx alboguttatus, sp. n.

Subrhomboidal, narrow, moderately shining, piceous, the legs obscure ferruginous in one specimen; variegated above and along the sides beneath with dense spots and patches of pure white scales, the white scales on the prothorax condensed into three more or less interrupted lines, and those on the elytra into a transverse patch at the shoulder, an interrupted band below it (extending from the fifth stria to the margin), an oblong spot on the second interstice at about one-fourth from the base, a larger spot on the disc towards the apex, and an oblique, anteriorly bifurcate streak at the tip; the rest of the upper surface clothed with smaller blackish, and that of the under surface with white, scales; the legs albosquamose. Head densely punctulate and squamose between the large eyes; rostrum curved, moderately stout, a little longer than the head and prothorax. Prothorax short, rounded at the sides, narrowing from near the base, constricted in front; densely, finely punctate. Elytra much wider than the prothorax, rather convex, triangular; deeply punctate-striate, the interstices feebly convex and closely punctate. Legs long and slender; femora unidentate; tarsal claws very small, free.

Length $1\frac{3}{4}$, breadth 1 millim.

Hab. ST. VINCENT, Leeward side.

Two specimens. Very like *C. alboplagiatus* and *C. sexguttatus*, but with numerous sharply-defined pure white spots above and beneath, much as in *C. semicostatus*, an insect with the elytral interstices sharply raised posteriorly.

Diorymerus perlævis (p. 214).

To the locality given, add:—GUATEMALA, Trece Aguas in Alta Vera Paz (*Schwarz & Barber, in U.S. Nat. Mus.*).

A second specimen of this species has now been seen. It is much larger than the Mexican type, measuring, length $3\frac{2}{5}$, breadth $2\frac{2}{5}$ mm.

20 (A). Diorymerus ruber, sp. n. (Tab. XXIII. figg. 14, 14 a.)

Rhomboid-ovate, narrow, convex, shining, rufous, the anterior femora and tibiæ and the rostrum slightly infuscate. Head almost smooth, transversely depressed between the eyes; rostrum arcuate, rather stout, a little longer than the prothorax, sparsely punctate, the antennæ inserted at about the middle. Prothorax slightly broader than long, strongly constricted in front, and hollowed along the flanks beneath, so as to appear margined at the sides anteriorly, smooth. Scutellum very small. Elytra compressed at the sides, rapidly and obliquely narrowing from the rounded humeri; with a very fine sutural stria only, for the rest smooth. Beneath almost impunctate. Legs rather long and slender; femora punctate, sulcate and unarmed beneath; anterior tibiæ curved from the base, strongly retractile; intermediate and posterior tibiæ almost straight, the intermediate pair angulate near the base externally, the posterior pair angulate near the base and apex.

Length $2\frac{1}{4}$, breadth $1\frac{1}{3}$ millim. (♂ ?)

Hab. MEXICO, Santa Lucrecia in Vera Cruz (*Knab, in U.S. Nat. Mus.*).

One specimen. A remarkably distinct form allied to the Panama *D. rubricatus* and *D. nigripes*, with the legs long and rather slender, the anterior tibiæ not angulate at the base externally, the prothorax margined at the sides anteriorly, the sutural stria very fine and placed close to the suture, the body almost wholly rufescent.

Diorymerus erythronotus (p. 220).

To the localities given, add:—MEXICO, Santa Lucrecia in Vera Cruz (*Knab, in U.S. Nat. Mus.*); GUATEMALA, Trece Aguas (*Schwarz & Barber, in U.S. Nat. Mus.*).

The Colombian *D. lævipennis*, Kirsch, the type of which I have recently examined, is closely related to the present species, but differs from it in the sharply angulate anterior tibiæ and the obsoletely striate elytra.

25. Diorymerus sulcatulus, n. n.

Diorymerus sulcatus, anteà, p. 222, t. 12. figg. 31, 31 a (nec Kirsch, 1875).

The specific name *sulcatus* is preoccupied for a Peruvian insect, and a new one is therefore required for the species described in this work.

DIASTETHUS (p. 223).**Diastethus falcatus** (p. 228).

To the Costa Rican locality given, add:—Esparta (*Knab, in U.S. Nat. Mus.*: ♀).

Two additional specimens (♀) of this species have now been seen from Costa Rica, agreeing with a Colombian example of the same sex in the British Museum. They

have the prosternum unarmed, but the metasternum and first ventral segment are hollowed down the middle as in the male.

20 (A). **Diastethus hirtimanus**, sp. n.

Rhomboidal, shining, black; glabrous above. Rostrum very long and slender, reaching the posterior margin of the metasternum, thickened and rugosely punctate laterally at the base, for the rest sparsely, minutely punctate, the antennæ inserted at about the basal fifth, the club oblong-ovate and rather small. Prothorax short, rapidly, arcuately narrowing from the base, strongly constricted in front, the base obliquely foveate on each side of the median lobe; sparsely, finely punctate. Elytra much wider than the prothorax, short, triangular, depressed along the suture; sharply punctate-striate, the interstices broad, flat, each with a few very minute scattered punctures down the middle. Beneath rather coarsely and closely punctate. Prosternum bifoveate in front. Femora unidentate. Tibiæ more or less angulate near the base externally, the anterior pair ciliate within and strongly sinuate. Tarsal joints 2 and 3 broad, the claws small and connate at the base.

Length $2\frac{1}{2}$, breadth $1\frac{3}{4}$ millim. (♂ ?)

Hab. MEXICO, Rio Balsas (*Wickham*).

One specimen, found by Mr. Wickham during the past year. This insect has the long slender rostrum of *D. gracilirostris* and the angular tibiæ of *D. humerosus*, but it is abundantly distinct from either of them.

CYLINDROCERUS (p. 237).

Since the publication of the description of *C. longipennis*, from the mountains of Guerrero (p. 241), I have seen an extremely closely allied form from the Antillean Island of St. Vincent*.

* *Cylindrocerus insularis*, sp. n.

♂. Elongate-rhomboidal, shining, black; the elytra with a patch of narrow ochreous scales at the base of the third interstice and a smaller one at the base of the fifth, and the first ventral segment with a large rounded patch of similar scales on each side. Head sparsely punctate, transversely depressed between the eyes; rostrum arcuate, a little longer than the elytra, slender, still narrower in its apical third, finely punctate, coarsely so at the sides to the points of insertion of the antennæ at about three-fifths from the base, the antennal club elongate, acuminate, and nearly as long as joints 3-7 of the funiculus united. Prothorax transverse, conical, constricted in front; very sparsely, minutely punctate. Elytra much wider than the prothorax, moderately long, triangular, transversely depressed before and beyond the middle, the humeri swollen; deeply punctate-striate, the punctures somewhat distant one from another, the interstices almost smooth, narrowly subcostate at the apex. Prosternum armed with two upwardly curved moderately long spines. Anterior tibiæ fringed with long ochreous hairs on the inner side from the middle to the apex. [Anterior tarsi probably dilated and clothed with long hairs.]

Length $5\frac{2}{3}$, breadth $2\frac{2}{3}$ millim.

Hab. ST. VINCENT, Leeward side.

One specimen, wanting the anterior tarsi. Nearly related to the Mexican *C. longipennis* (type of which is a ♀), but with less elongate, deeply punctate-striate elytra, the third interstice less widened at the base and the fifth also with a few ochreous scales at this place, the humeri more prominent, the first ventral segment with a large ochreous patch on each side, the antennal club not so stout, &c. M. Bovie has sent me a very similar unnamed species from Colombia.

GERÆUS (p. 261).

Mr. Wickham has been kind enough to send us the Barids obtained during his recent expedition to Mexico, and amongst them are various additional species of this genus. The following were also sent, in addition to those specially mentioned below, from Cuernavaca or Puente de Ixtla, Morelos:—*G. gracilis* (♂ ♀), *G. picumnus*, *G. bicruciatatus*, *G. tonsilis*, *G. varipes* (♀), and *G. pallidicornis* (♀).

Geræus rectispinis (p. 265).

To the localities given, add:—MEXICO, Cordova (*Knab, in U.S. Nat. Mus.*).

A fully-developed male from Cordova, evidently conspecific with the Jalapa specimens here included under *G. rectispinis*, has the prosternal spines fully as long as the elytra and bent downwards at the tip, and the smooth, circular prosternal cavity very large and deep.

32 (A). **Geræus squamirostris**, sp. n. (Tab. XXIII. figg. 15, 15 *α*, ♂; 16, ♀.)

Oblong, rhomboid-ovate, black; somewhat thickly clothed with narrow ochraceous or whitish scales, those on the elytra arranged in two rows along each interstice (sometimes increasing to three at the base), the vestiture of the under surface coarser and closer. Head sparsely punctate; rostrum (♂) a little longer than the head and prothorax, strongly arcuate, rather stout, much thickened towards the base, densely punctate, squamose above and beneath, (♀) abruptly flattened, widened, bare, and almost smooth from about one-third from the base, the basal portion stout, arcuate, squamose above, and closely punctate, the antennæ inserted near the middle in the ♂ and at the basal third in the ♀. Prothorax not much broader than long, rounded at the sides anteriorly, constricted in front; densely punctate, with indications of a smooth incomplete median line. Scutellum small, almost bare. Elytra a little wider than the prothorax, rounded-triangular, narrowly punctate-striate, the interstices rugose. Beneath densely punctate; first ventral segment slightly depressed down the middle in the ♂. Anterior coxæ widely separated. Tibiæ feely unguiculate.

♂. Prosternum armed with a small conical tubercle in front of each coxa.

Length $3\frac{1}{2}$ –4, breadth $1\frac{1}{2}$ – $1\frac{3}{4}$ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca in Morelos (*Wickham*).

Two males and four females. Near *G. finitimus* (Casey), but with a less transverse prothorax, the rostrum of the male squamose above and beneath and less evenly arcuate, much thickened at the base in both sexes, the anterior tibiæ of the male feebly unguiculate, the prosternum armed with small conical tubercles as in *G. bituberculatus* *. The sexual differences in the form of the rostrum are almost as strongly marked as they are in *G. hospes*.

32 (B). **Geræus subinermis**, sp. n. (Tab. XXIII. figg. 17, 17 *α*, ♂.)

Rhomboid-ovate, black, somewhat thickly clothed with narrow whitish scales, those on the elytral interstices biserially arranged. Head finely punctate; rostrum (♂) regularly arcuate, gradually thickened towards the base, a little longer than the head and prothorax, and closely punctate, (♀) flattened, widened, and almost smooth from about the basal third, the basal portion stout and closely punctate.

* I have seen two specimens only of *G. finitimus*, from Texas, both males, one with the prosternal spines reduced to small tubercles as in the present species.

Prothorax strongly transverse, rounded at the sides anteriorly and constricted in front; densely, finely punctate. Scutellum small, almost bare. Elytra considerably wider than the prothorax, subtriangular; narrowly punctate-striate, the interstices rugose. Beneath closely punctate; first ventral segment slightly depressed down the middle in the ♂. Anterior coxæ separated by about their own width. Tibiæ feebly unguiculate, the anterior pair almost straight.

♂. Prosternum with a very small tubercle in front of each coxa.
Length 3–3½, breadth 1½–1½ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca (*Wickham*: ♂ ♀), Chilpancingo (*H. H. Smith*: ♂).

Five males and three females. This insect differs from *G. squamirostris* in having the prothorax relatively shorter and considerably narrower than the elytra, the rostrum of the male evenly arcuate and almost bare beneath, that of the female less widened outwards and not so abruptly flattened, the prosternum of the male with a minute tubercle in front of each coxa. The shorter and stouter rostrum, the less elongate vestiture, the bituberculate prosternum of the male, &c., separate *G. subinermis* from all the forms of *G. penicellus*, a common species at Cuernavaca. Compared with *G. gracilis*, the female has a broader, flatter, and smoother rostrum, and the male less sinuate anterior tibiæ and an almost unarmed prosternum.

***Geræus x-notatum* (p. 282).**

To the Mexican localities given, add:—Cuernavaca (*Wickham*: ♂).

Described from two females. The male has two moderately long porrect prosternal spines and the anterior tibiæ hollowed on the inner side towards the apex.

50 (A). ***Geræus costatus*, sp. n.** (Tab. XXIII. figg. 18, 18 a, ♀.)

Geræus sp., *antch*, p. 269, *nota*.

Rhomboid-ovate, robust, subopaque above, shining beneath, black; sparsely clothed with small, hair-like, inconspicuous scales, the elytral interstices 2–6 each with a dense patch of coarser, narrow, ochreous scales at the base, together forming a sinuous basal fascia. Head closely punctate, foveate between the large eyes; mandibles angulate at the base beneath; rostrum arcuate, about as long as the head and prothorax, stout, thickened towards the base, closely punctate, the apical half almost smooth, the antennæ inserted at the middle. Prothorax transverse, deeply bisinuate at the base, narrow and tubulate in front, the sides strongly rounded anteriorly; densely, rather coarsely punctate. Elytra subtriangular, much wider than the prothorax, conjointly rounded at the apex; punctato-sulcate, the interstices costate and densely, coarsely punctate. Beneath coarsely, closely punctate. Anterior coxæ narrowly separated. Legs short; all the tibiæ dilated at the apex externally; third tarsal joint broadly bilobed.

Length 6½, breadth 3½ millim. (♀.)

Hab. MEXICO, Mexico city (*Herrera*, in *U.S. Nat. Mus.*).

One female, with the legs somewhat injured. This conspicuous species is not unlike *G. scabrosus* and *G. inornatus*, but on account of the shorter and stouter rostrum it seems to be more nearly related to *G. tenebricosus*, *G. pugnax*, and *G. basinotatus*. The rugose, costate, basally ochreo-fasciate elytra readily distinguish *G. costatus* from all the other species of the genus described in this work. The prosternum is doubtless spined in the male.

53 (A). *Geræus puerulus*, sp. n. (Tab. XXIII. figg. 19, ♀; 20, ♂.)

Oblong-subrhomboidal, narrow, shining, black, the apex of the rostrum, the antennæ, and the legs often, in part or wholly, ferruginous; somewhat thickly clothed with rather coarse, narrow, white scales, the elytra sometimes with a few brownish scales intermixed—those on the prothorax condensed into two short, curved, longitudinal lines on the disc at the base and a small patch on the median lobe, those on the elytra closely, biserially placed along each interstice, and condensed into a faint scutellar patch and an indistinct oblique fascia on the disc beyond the middle. Head sparsely punctate, transversely depressed between the eyes; rostrum (♂) strongly arcuate, much longer than the head and prothorax, slender, gradually thickened towards the base, the basal portion finely punctured, the rest almost smooth, (♀) a little longer, flattened and somewhat dilated towards the tip. Prothorax transverse, gradually, arcuately narrowing from the base, constricted in front; densely punctate, with indications of a smooth median line. Scutellum small, almost bare. Elytra considerably wider than the prothorax, subtriangular; narrowly punctate-striate, the interstices rugulosely punctate. Beneath densely punctate; first ventral segment depressed down the middle in the ♂. Anterior coxæ somewhat narrowly separated. Legs long and slender.

♂. Prosternum in fully developed examples slightly hollowed down the middle and armed with two very short, slender, erect, blunt spines, which are partly hidden by the vestiture.

Length $2\frac{1}{2}$ –3, breadth $1\frac{1}{4}$ – $1\frac{1}{2}$ millim. (♂ ♀.)

Hab. MEXICO, Cuernavaca and Puente de Ixtla in Morelos (*Wickham*).

Four males and four females, one of the former wanting the prosternal spines. A small, narrow form of *G. submaculatus*, with the vestiture almost wholly whitish, and condensed into similar markings on the prothorax and elytra. One of the two specimens of *G. submaculatus* from Guatemala is of the same size, but it is easily separated from the present insect by the more rounded sides of the prothorax and the large admixture of brown scales on the elytra.

77 (A). *Geræus tonsus*, sp. n. (Tab. XXIII. figg. 21, 21 a, ♂.)

Geræus sp.?, anteà, p. 298¹.

Oblong-rhomboidal, flattened above, black; thickly clothed with small cinereous scales—hair-like and transversely arranged on the prothorax, oblong and placed in two or three compact lines down each elytral interstice,—the vestiture coarser, denser, and whiter along the sides of the body beneath. Head finely punctate; rostrum (♂) a little longer than the head and prothorax, arcuate, rather slender, thickened towards the base, closely punctate, (♀) flatter and much smoother from about the basal third, the antennæ inserted near the middle in both sexes. Prothorax strongly transverse, rounded at the sides anteriorly, constricted in front; densely, finely, subconfluently punctate, with indications of a smooth raised median line. Scutellum small, almost bare. Elytra oblong-subtriangular, narrowly punctate-striate, the interstices densely, rugulosely punctate. Beneath densely punctate; first ventral segment broadly excavate in the ♂. Anterior coxæ separated by about their own width. Prosternum unimpressed, unarmed in the ♂. Anterior tibiæ without visible uncus in either sex.

Length $3\frac{1}{4}$ – $4\frac{3}{4}$, breadth $1\frac{1}{2}$ – $2\frac{1}{5}$ millim. (♂ ♀.)

Hab. MEXICO (*Truqui and Dupont*, in *Mus. Brit.*), Guanajuato¹ (*Sallé*: ♂ ♀), Mexico city¹ and Hidalgo (*Barrett*, in *U.S. Nat. Mus.*: ♂ ♀).

Additional specimens of this insect have now come to hand, sufficient for a detailed description. *G. tonsus* is a form of *G. tonsilis*, with the vestiture of the upper surface finer, the prothorax strongly transverse and more finely and more densely punctured, and the scales on the elytra less elongate and much smaller.

77 (B). **Geræus penicellus**. (Tab. XXIII. figg. 22, 22 *a*, var., ♀.)

Curculio penicellus, Herbst, Käfer, vii. p. 29, t. 99. fig. 6¹.

Baridius penicellus (amictus), Say, Descr. N. Am. Curc. p. 17 (1831)²; Complete Writings, i. p. 281³.

Centrinus penicellus, Lec. Proc. Am. Phil. Soc. xv. p. 308⁴; Casey, Ann. N. York Acad. Sci. vi. pp. 576, 591⁵.

Centrinus holosericeus, Gyll. in Schönh. Gen. Curc. iii. p. 760⁶.

Baridius pubescens, Uhler, Proc. Acad. Phil. vii. p. 417⁷.

Balaninus tomentosus, Klug, in litt.⁸.

Hab. NORTH AMERICA^{1-3 6}, New York to Florida and Louisiana⁴, Iowa and Indiana⁵, Virginia⁷.—MEXICO, Puente de Ixtla and Cuernavaca in Morelos (*Wickham*: ♂ ♀), Amula (*H. H. Smith*: ♀).—CUBA^{6 8}.

Mr. Wickham has sent us a long series of this common N.-American species from Mexico, one of them with the subsutural apical spots distinct, one with the dark spots extending on to the disc, and the rest with the vestiture of the elytra uniformly ochraceous or whitish, as described by Uhler. The two females from Amula doubtfully referred to *G. sinuatipes* (antea, p. 276) also belong here. *G. penicellus* has the prosternum unarmed in the male, but otherwise it is very like many of the species placed under "b⁴" in the Table. The closely related *G. tonsilis* has a stouter rostrum, non-unguiculate anterior tibiæ in the male, &c.

80 (A). **Geræus tenuistriatus**, sp. n. (Tab. XXIII. figg. 23, 23 *a*, ♀.)

Oblong-rhomboidal, flattened above, black; densely clothed with small adpressed white scales—those on the prothorax long, narrow, and transversely arranged, those on the elytra oblong-oval and placed in four compact rows along each interstice (the first with three rows only), and those on the under surface rather broad and oval,—the scutellum and humeral callosities bare. Head densely punctate, squamose; rostrum arcuate, about twice as long as the prothorax, slender, very slightly thickened at the base (as seen in profile), flattened and widened towards the tip, finely punctate and feebly carinate in its basal half, the apical portion almost smooth, the antennæ inserted at the middle. Prothorax strongly transverse, conical; densely, very finely punctate. Scutellum subquadrate, rather large. Elytra much wider than the prothorax, rather long, subtriangular, the humeri rather prominent; very finely and shallowly punctate-striate, the interstices broad, flat, and densely rugulose. Beneath densely punctate. Prosternum shallowly sulcate.

Length $4\frac{1}{8}$, breadth $2\frac{1}{10}$ millim. (♀.)

Hab. MEXICO (*ex coll. Solari*).

One female, in bad condition. Closely related to *G. candidus*, but more flattened above, the rostrum longer and quite slender throughout, the antennæ inserted at the middle, the elytral striæ very fine, shallow, and inconspicuous, the prothorax rapidly and obliquely narrowing from the base. The faintly striate elytra and the long, slender rostrum separate *G. tenuistriatus* from all the other Mexican species of the genus.

Geræus hospes (p. 300).

In the description of the male of this species I omitted to note that the anterior femora have a compressed angular prominence at the base beneath, and that joints 2-7 of the funiculus are set on the lower face with long bristly hairs.

ODONTOCORYNUS (p. 317).

5. Odontocorynus salebrosus. (Tab. XXIII. fig. 24.)

Centrinus (*Odontocorynus*) *salebrosus*, Casey, Ann. N. York Acad. Sci. vi. pp. 577, 598¹.

Hab. NORTH AMERICA, New York to Texas¹.—MEXICO (*Mus. Brit.*: ♀), Cuernavaca (*Wickham*: ♂ ♀).

Mr. Wickham has recently sent us about a dozen examples of this insect from Cuernavaca. They have narrower, longer, and more slender scales on the upper surface than in the single specimen communicated by Col. Casey, who, however, states¹ that the vestiture is very variable in form. *O. salebrosus* is a close ally of *O. scutellum-album* (Say), which will probably be found to extend into Mexico also.

CENTRINITES (p. 320).

5. Centrinites tibialis.

♂. *Centrinus tibialis*, Kirsch, Berl. ent. Zeitschr. 1875, p. 271¹.

♂. *Centrinites dentimanus*, anteà, pp. 321, 323, t. 17. figg. 4, 4 a, b².

To the locality given², add :—PERU, Pozuzu¹.

The affinity of the Teapa insect with the Peruvian *C. tibialis* was unfortunately overlooked, though the unique type of the latter had been lent me by Dr. Heller for examination. The two Mexican specimens merely differ from it in having the vestiture a little coarser, and the setiform white scales more numerous on the elytra. A similarly extended distribution has been recorded for *Ampelogypter ovalis* (anteà, p. 388).

LASIOBARIS, gen. nov. (to follow the genus *Centrinites*, p. 324).

Mandibles stout, curved, notched within, decussate; rostrum stout, strongly areuate, abruptly bowed from the base, not longer than the head and prothorax, the antennæ inserted at the middle, joints 3-7 of the funiculus transverse, widening outwards, 1 elongate, the club ovate and densely pubescent; prothorax strongly bisinuate at the base; scutellum very small, free; elytra much wider than the prothorax, subtriangular, narrowing from the oblique humeri; pygidium not visible; prosternum hollowed down the middle for the reception of the funiculus, unarmed; anterior coxæ somewhat narrowly separated; femora unarmed; tibiæ acutely dilated at the outer apical angle, the apical unguis short; tarsal claws small, contiguous at the base; body ovate or oblong-ovate, coarsely sculptured, the prothorax with large rounded umbilicate punctures, clothed with fine, bristly, hair-like scales.

Type, *L. wickhami*.

The two insects from which the above characters are taken are nearly related to

Centrinites, but they differ from all the species referred to that genus in their small, subcontiguous tarsal claws, the more curved mandibles, the abruptly bowed, shorter rostrum, and the peculiar sculpture and vestiture of the body. The surface-sculpture is like that of *Baris strenua*, and the vestiture is fine and hair-like, extending along both the striæ and the interstices of the elytra. We are indebted to Mr. Wickham for the types of both species, which were captured by him in Mexico during the past year, showing that such well-known localities as Cuernavaca are by no means thoroughly investigated*.

1. *Lasiobaris wickhami*, sp. n. (Tab. XXIII. figg. 25, 25 a, ♂.)

♂. Broad-ovate, robust, subopaque, rufo-piceous; above and beneath, the legs, and antennæ somewhat thickly clothed with rather long, semierect, pallid, bristly hairs, which are arranged in a single row along each of the elytral sulci and interstices. Head shallowly, transversely grooved and somewhat rugosely punctate between the eyes, the vertex finely punctured; rostrum about as long as the prothorax, slightly flattened at the tip, coarsely, closely punctate. Prothorax transverse, feebly constricted in front, the sides rounded anteriorly and subparallel at the base; densely pitted with large, rounded, umbilicate punctures, the disc with an abbreviated raised median line. Scutellum very small, transverse. Elytra convex, much broader than the prothorax, rounded-triangular; coarsely, broadly punctato-sulcate, the interstices (the narrow sutural one excepted) as wide as the sulci, finely costate on each side, and with a closely-packed single series of coarse punctures down the middle. Beneath very coarsely, densely punctate; first ventral segment slightly depressed down the middle, the fifth foveate at the apex.

Length $4\frac{1}{2}$, breadth $2\frac{1}{3}$ millim.

Hab. MEXICO, Cuernavaca in Morelos (*Wickham*).

One specimen, probably somewhat immature.

2. *Lasiobaris geminata*, sp. n. (Tab. XXIII. figg. 26, 26 a.)

Oblong-ovate, somewhat flattened above, opaque, piceous, the outer margins of the elytra, the rostrum, antennæ, and legs rufescent; sparsely clothed with very small, fine, hair-like, decumbent, pallid scales, those on the elytra arranged in a single line down each of the sulci and interstices. Head finely punctate, transversely grooved between the eyes; rostrum nearly as long as the head and prothorax, closely, coarsely punctate. Prothorax transverse, constricted in front, the sides obliquely converging from the base and rounded anteriorly; densely pitted with large, rounded, umbilicate punctures, the disc with an abbreviated raised median line. Scutellum small, oblong, apparently divided across the middle, the anterior portion rounded, the posterior portion transverse. Elytra rather elongate, rapidly narrowing from the oblique humeri; coarsely, broadly punctato-sulcate, the interstices as wide as the sulci, finely costate on each side, and with a closely-packed single series of moderately coarse punctures down the middle. Beneath very coarsely, densely punctate.

Length $4\frac{1}{10}$, breadth 2 millim. (♀?)

Hab. MEXICO, Rio Balsas (*Wickham*).

One specimen. Longer, flatter above, and with the vestiture much shorter, finer, and sparser than in *L. wickhami*, the prothorax obliquely narrowing from the base, the interstitial punctures on the elytra not so large (much finer than those of the striæ), the scutellum apparently divided into two.

* He has also sent us *Pseudocentrinus ochraceus*, ♂ and ♀, from this place.

LEPTOSCHÆNUS (to follow the genus *Platyonyx*, p. 329).

Leptoschoinus, Schönherr, Gen. Curc. viii. 1, p. 264 (1844) ; Lacordaire, Gen. Col. vii. p. 237.

Leptoschænus, Gemminger & Harold, Cat. Col. viii. p. 2635.

This genus is based on a single Tropical-American species, the Mexican habitat of which we are now able to confirm, Mr. Wickham having recently sent us specimens of it from Cuernavaca. *Leptoschænus* is closely related to *Platyonyx*, differing from it in the non-dilated fourth tarsal joint in the male and the greatly elongated, compact cylindrical antennal club in that sex. The elytra are broadly and separately rounded at the apex (as in *Platyonyx*), leaving the tip of the last dorsal segment exposed ; the eyes are very large ; and the mandibles (as in *Geræus*) are almost straight on their inner edge, and do not overlap at the tip when closed. Two species here referred to *Geræus* (*G. longiclava* and *G. tenuiclava*) have the antennal club of the male formed much as in *Leptoschænus maculatus*, but they are not otherwise nearly related to it.

1. *Leptoschænus maculatus*. (Tab. XXIII. figg. 27, 27 a, ♀ ; 28, ♂.)

Cylindrocerus maculatus, Boh. in Schönh. Gen. Curc. iii. p. 793 (♂ ♀) ¹.

Leptoschoinus maculatus, Schönh. op. cit. viii. 1, p. 265 ² ; Lacord. Gen. Col. vii. p. 238 ³.

Leptoschænus maculatus, Gemm. & Harold, Cat. Col. viii. p. 2635 ⁴.

♀. Rostrum strongly arcuate, tapering, slender, smooth and bare from near the base, the antennæ inserted far behind the middle, with joint 2 of the funiculus nearly as long as 3 and 4 united, the club rather more than half the length of the funiculus.

Hab. MEXICO ³, Cuernavaca (*Wickham* : ♀).—SOUTH AMERICA, Cayenne ^{3 4}, Brazil ¹⁻⁴.

Two females, differing from Lacordaire's description in having the second joint of the funiculus much shorter than the first. The figure (28) of the antenna, &c., of the male is taken from a Brazilian example.

CATAPASTUS (p. 333).

2. *Catapastus nivescens*, sp. n. (Tab. XXIII. figg. 29, 29 a, ♀.)

Ovate, black, densely clothed with rather large, adpressed, pure white scales—those on the prothorax long and transversely arranged, those on the elytra oblong-ovate and closely, biseriately placed along each interstice, and those on the under surface broadly oval. Head densely punctate and squamose, the eyes rather small ; rostrum feebly curved, a little longer than the head and prothorax, gradually thickened towards the base, rather slender at the tip, densely punctate, squamose in its basal half, the antennæ inserted slightly behind the middle. Prothorax strongly transverse, rapidly, arcuately narrowing from the base, not constricted in front ; densely, rugosely punctate. Scutellum almost bare. Elytra with the sides forming an almost continuous oval outline with the prothorax, deeply punctate-striate, the interstices rugose. Beneath densely punctate. Prosternum shallowly depressed along the middle. Anterior coxæ narrowly separated. Legs short, densely squamose.

Length $3\frac{1}{2}$, breadth $1\frac{1}{2}$ millim. (♀.)

Hab. MEXICO, Rio Balsas (*Wickham*).

One specimen, in very fresh condition. This insect agrees sufficiently well with *C. ruficlava* to be included in the same genus. The regularly oval outline, the dense, pure white, coarse vestiture, the almost bare scutellum, and the long rostrum are its principal characters. The tarsal claws are connate at the base and the mandibles are slightly decussate at the tip, as in the typical species of *Catapastus*. The rows of scales on the elytra are increased to three at the base and reduced to one at the apex.

CALANDRINUS (p. 339).

Calandrinus grandicollis (p. 339).

To the locality Mexico, add:—Sátillo in Coahuila (*Wickham*).

ZAGLYPTUS (p. 339).

Since the account of this genus was published, I have seen a minute form, from the Antillean Island of St. Vincent, closely related to *Z. minutissimus* (p. 341), also specimens of an allied new genus from the same locality*.

* *Zaglyptus quadriguttatus*, sp. n.

Rufo-testaceous, the eyes black; clothed above with scattered, short, erect, light and dark setae intermixed with a few decumbent, hair-like, ochreous scales, the elytra with a small dense patch of narrow yellowish-white scales on each shoulder and another on the fifth interstice towards the apex; the legs with a few erect pallid setae. Rostrum stout, arcuate, a little longer than the head and prothorax. Prothorax short, conical, uneven, alutaceous, sparsely punctate, subcarinate at the base. Elytra much wider than the prothorax, triangular, somewhat flattened on the disc anteriorly, with rows of rather coarse punctures placed along fine shallow setae, the interstices feebly convex, faintly punctulate.

Length $1-1\frac{1}{2}$, breadth $\frac{2}{3}-\frac{2}{3}$ millim.

Hab. ST. VINCENT, Mount Gay Estate, Leeward side (*H. H. Smilh*).

Three specimens. Very near the Guatemalan *Z. minutissimus*, but less convex, and with the setae shorter and fewer in number, the elytra each with a small densely squamose spot on the shoulder and another on the disc towards the apex.

ZAGLYPTOIDES, gen. nov.

Rostrum abruptly separated from the head, arcuate, moderately stout, about half the length of the body, the scrobes gradually descending, the antennae inserted at or near the middle, the funiculus 7-jointed, joints 2-7 transverse, closely articulated, and gradually widening, the club pubescent, stout, oblong-ovate, as long as the preceding 6 joints united; eyes very narrow, strongly transverse; prothorax short, convex, conical, feebly sinuate at the base, abruptly tubulate in front, the tubulate portion separated from the rest by a deep transverse groove; scutellum very small, free, transverse; elytra much wider than the prothorax, triangular, inflated, without trace of striae on the disc, the apices conjointly rounded and extending for a short distance downward on a lower plane than the rest of the surface, completely protecting the apex of the abdomen in repose; prosternum narrowly and deeply sulcate from the apex to between the coxae, the latter separated by less than their own width; intermediate and posterior coxae widely separated; mesosternum subvertical, the transverse suture distinct; mesothoracic epimera narrowly ascending; metathoracic episterna narrow; ventral segments 2-4 short, 1 and 2 connate; femora linear, unarmed; tibiae slender, without visible uncus at the tip; tarsi with a few fine hairs

LIMNOBARIS (p. 343).

14 (A). *Limnobaris parilis*, sp. n. (Tab. XXIII. figg. 30, 30 a.)

Oblong-ovate, moderately shining, black, the tarsi piceous; sparsely clothed with small narrow white scales, those on the prothorax hair-like, and those on the elytra coarser, setiform, and arranged in a single line down each interstice, the interstices 2-4 with a few additional white scales at the base, those on 2 clustered into a distinct oblong spot. Head closely punctate, transversely depressed and foveate between the eyes; rostrum strongly arcuate, moderately stout, nearly as long as the head and prothorax, sparsely, finely punctate, the antennæ inserted at about the middle, the outer joints of the funiculus strongly transverse and nearly as wide as the club. Prothorax much broader than long, feebly constricted in front, the sides parallel at the base and arcuately converging towards the apex; densely, finely punctate, except along the smooth median line. Elytra slightly wider than the prothorax, very gradually narrowing from the base, somewhat flattened at the middle of the disc; deeply punctate-striate, the interstices rather coarsely and closely uniseriate-punctate. Beneath closely punctate. Prosternum unimpressed behind the transverse subapical groove. Anterior coxæ separated by rather more than their own width.

Length $2\frac{3}{4}$, breadth $1\frac{1}{2}$ millim. (♀ ?)

Hab. MEXICO, Cordova (*Knab, in U.S. Nat. Mus.*).

One specimen. Shorter and broader than *L. languida*, the rostrum shorter, the head foveate between the eyes, the vestiture much sparser, that on the elytra setiform and uniseriately arranged, the second interstice with a white spot at the base. The strongly transverse prothorax, shorter rostrum, &c., separate *L. parilis* from *L. desidiosa*. The mandibles are decussate, and the pygidium is not visible, as in the other species of *Limnobaris**.

beneath, joint 3 simple, slightly wider than 2, the claws long and divergent; body short, rhomboidal, convex, polished, glabrous, except for a few erect hairs above.

This genus is related to *Diastethus* and *Diorymellus*, but the third tarsal joint is simple as in *Zaglyptus*.

Zaglyptoides ferrugineus, sp. n.

Rufo-ferruginous, the eyes black, the prothorax and elytra with a few fine, erect, ochreous hairs arising from widely scattered punctures, those on the elytra seriatly arranged. Rostrum almost smooth. Elytra with rather coarsely punctured fine marginal striæ only, the humeri somewhat swollen. Metasternum coarsely punctate, the propleura smooth.

Length $1\frac{1}{2}$ — $1\frac{1}{3}$, breadth $\frac{2}{3}$ — $\frac{3}{4}$ millim.

Hab. Sr. VINCENT, Black Forest Estate, Windward side, and Leeward side (*H. H. Smith*).

Seven specimens. A minute insect of about the same size and shape as the smaller members of the genus *Zaglyptus*, but readily separable therefrom by the abruptly tubulate prothorax, the more transverse eyes, &c.

* The following species is included in the Antillean collections at the British Museum :—

Limnobaris antillarum, sp. n.

Oblong-elliptic, flattened above, shining, black, the tarsi and antennæ obscure ferruginous; subglabrous, the punctures on the under surface and legs each bearing a minute scale. Head finely punctate, transversely grooved between the eyes; rostrum arcuate, rather slender, subcylindrical, slightly thickened towards the base, a little longer than the head and prothorax, very sparsely, minutely, punctate, the basal portion rugulose laterally, the antennæ inserted at about the basal third. Prothorax strongly transverse, feebly constricted and much narrowed in front, the sides parallel at the base and rounded

ORTHORIS (to follow the genus *Pseudorthoris*, p. 358).

Orthoris, Leconte, Proc. Am. Phil. Soc. xv. p. 286 (1876); Casey, Ann. N. York Acad. Sci. vi. pp. 467, 570.

We are indebted to Mr. Wickham for sending us a Mexican representative of this American genus, remarkable amongst the Barids on account of the non-unguiculate tibiae, the tarsal claws, on the contrary, being long and divergent. The type, *O. crotchi*, Lec., appears to be a common insect in Colorado, California, Texas, &c., and it may also occur in Mexico.

1. *Orthoris cylindrifer*. (Tab. XXIII. figg. 31, 31 a, ♂.)

Orthoris cylindrifer, Casey, Ann. N. York Acad. Sci. vi. pp. 570, 571¹; Pierce, Ent. News, 1907, p. 381².

Hab. NORTH AMERICA, Arizona¹, Texas².—MEXICO, Cuernavaca, Puente de Ixtla (*Wickham*).

The two specimens received agree very nearly with Casey's description, which was based on a single female example. The antennal club is very elongate in both sexes. The ventral segments 1 and 2 are deeply excavate down the middle in the male. *O. cylindrifer*, according to Pierce², breeds in the stems and roots of *Mentzelia oligosperma* (order Loasææ), a plant inhabiting Northern Mexico*.

BUSCKIELLA, n. n.

Busckia, anteà, p. 454 (Feb. 1909) (nec Dyar, 1902).

The generic name *Busckia* is preoccupied in Lepidoptera and must therefore be changed.

1. *Busckiella lecythidis*.

Busckia lecythidis, anteà, p. 454, t. 22. figg. 4, 4 a-c.

anteriorly; finely, somewhat closely punctate, except along the smooth median line, the punctures becoming coarser and confluent at the sides. Scutellum small, transverse. Elytra considerably wider than the prothorax, oblong-cordate, depressed along the suture; sharply punctato-sulcate, the interstices flat, 2 and 3 finely and confusedly, and the others closely, uniseriately, punctate. Beneath closely punctate. Prosternum slightly depressed down the middle anteriorly. Anterior coxæ small, separated by about one and a half times their own width.

Length 4, breadth $1\frac{5}{8}$ millim. (♀?)

Hab. ST. VINCENT, Windward side (*H. H. Smith*).

One specimen. Not unlike *L. (Baridius) æthiops*, Kirsch, from Sarayaen, but larger and more narrowed in front and behind, the elytra depressed along the suture and deeply sulcate, the rostrum longer and more slender, &c.

* Biol. Centr.-Amer., Botany, i. p. 473.

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[Names in small capitals refer to Families, &c. ; those in roman type to the chief reference to each species included in the work ; those in italics to species incidentally mentioned, synonyms, &c.]

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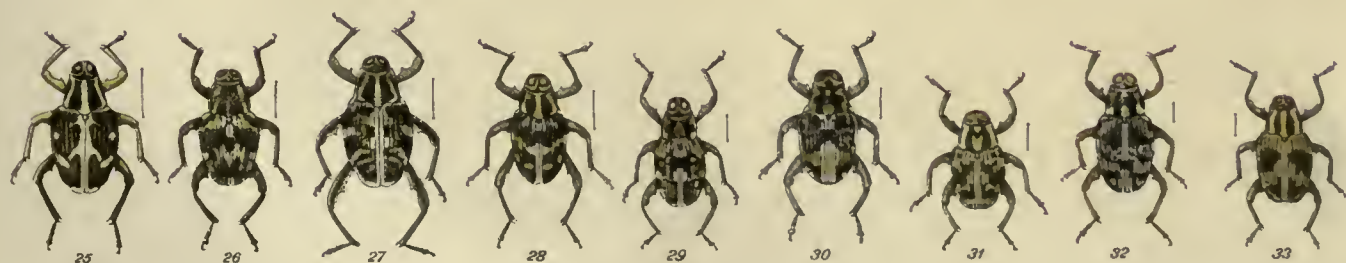
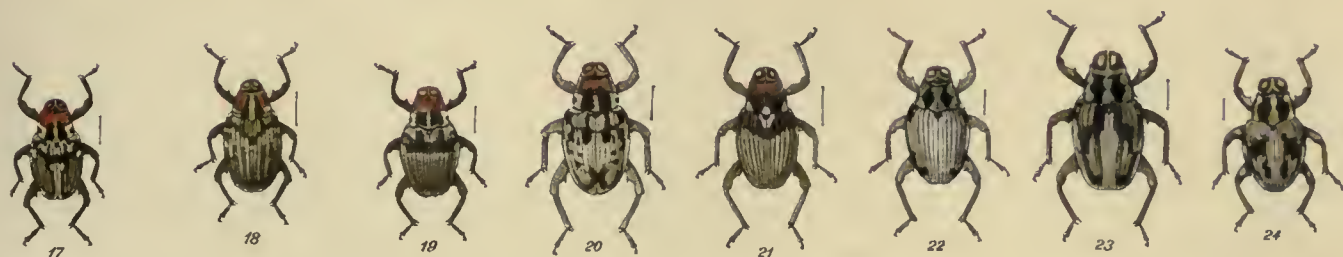
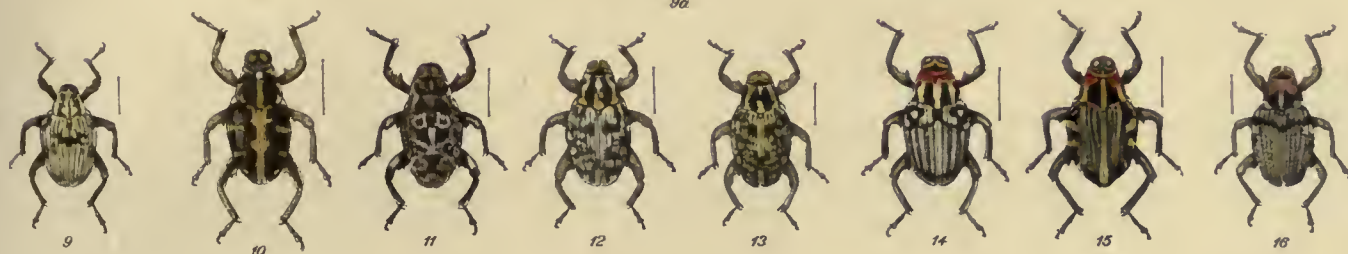
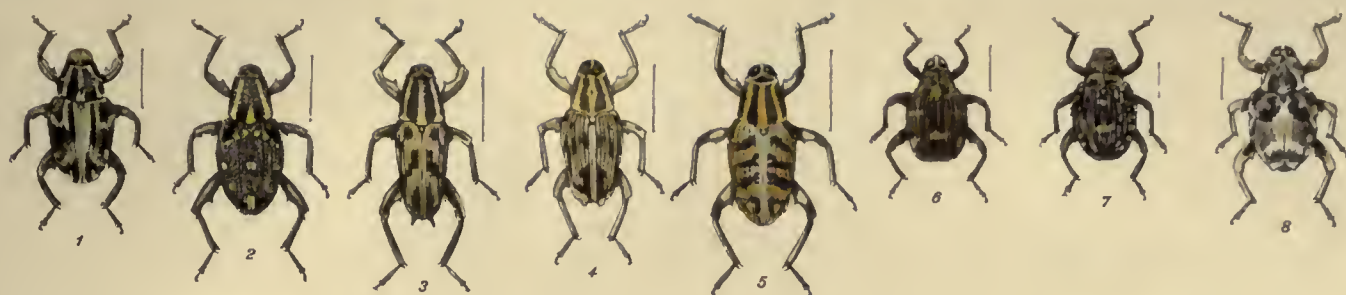
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 19 " ALBOGUTTATUS.
 20 " RUFOMACULATUS
 21 " NITIDICOLLIS

22 LECHRIOPS ALBOVARIEGATUS
 23 " EXCAVATUS.
 24 " MACULICEPS
 25 " COARCTATUS
 26 " VESTITUS
 27 " OCHREOGUTTATUS
 28 " QUADRIPUNCTATUS
 29 " STICTICUS.
 30 " BIGOLOR
 31 " ANALIS.
 32 " AURITUS



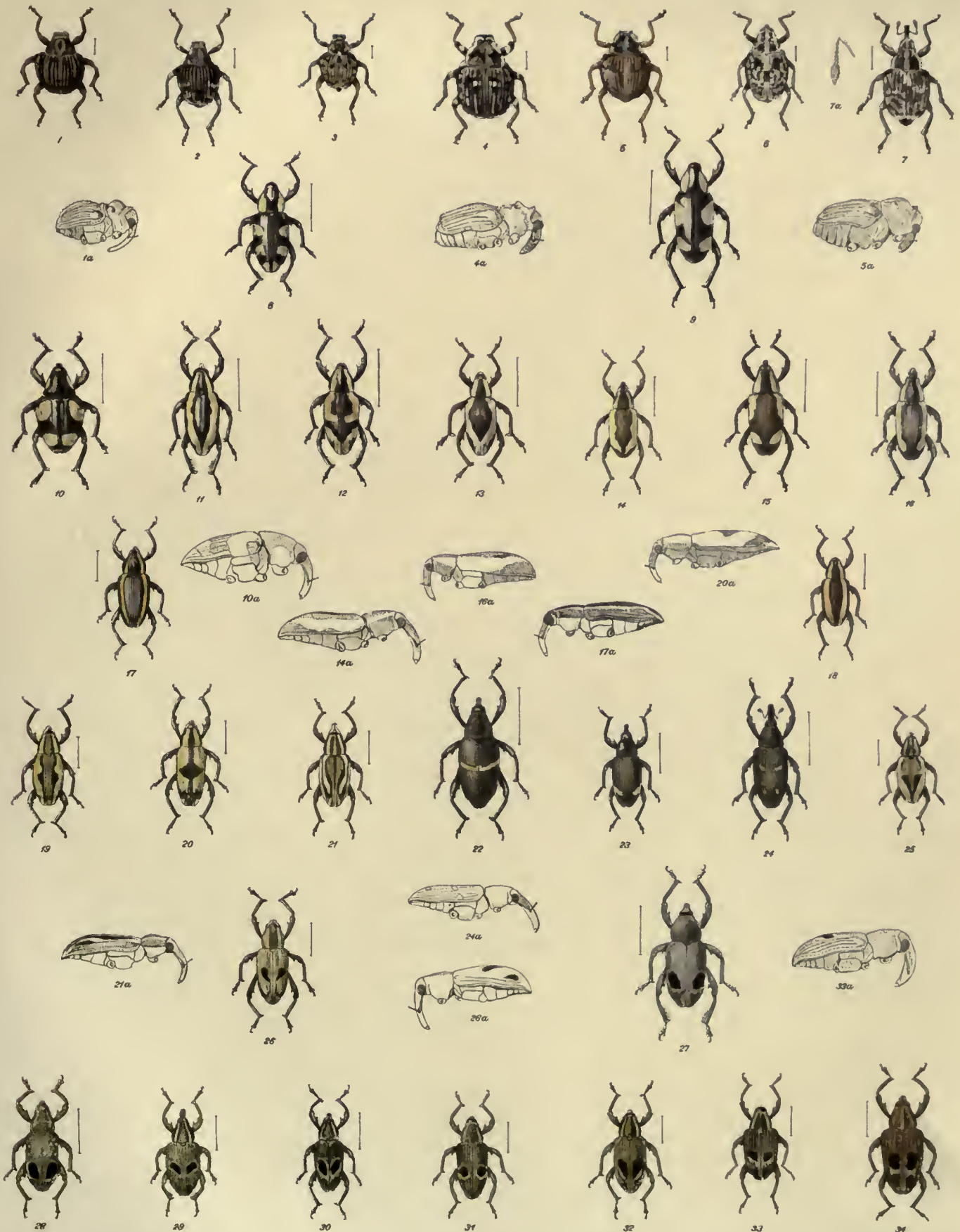
- 1 LECHRIOPS INFUSUS.
2 " FESTIVUS.
3 " PAROTICUS.
4 " ALBOTERMINATUS.
5 " PORCATUS.
6 " DURANGOANUS.
7 " FLAVOFASCIATUS.
8 EULECHRIOPS 7-NOTATUS.
9 " OCHRACEUS.
10, 10a " SQUAMULATUS.
11 " NIGROLINEATUS.

- 12, 12a EULECHRIOPS BOOPS.
13 " MELAS.
14 " LUGUBRIS.
15 " MELANCHOLICUS.
16 " BREVIPES.
17, 17a " TUBERCULIFER.
18 " FLAVITARSIS.
19 " ALBOFASCIATUS.
20 " ORNATUS.
21 " MUTICUS.
22, 22a " LONGIPENNIS.

- 23 EULECHRIOPS ELONGATUS.
24 " CYLINDRICOLLIS.
25 " SCUTULATUS.
26 " SEXNOTATUS.
27 " ALBOLINEATUS.
28 " DUCTILIS.
29, 29a " NITIDUS.
30 " SERIATUS.
31 " LEUCOSPILUS.
32 " PLAGIATUS.
33 " MACULICOLLIS.



1	EULECHRIOPS	LÆVIROSTRIS	12, 12a	TACHYGONUS	LATICRUS.	23, 23a	TACHYGONUS	FLOHRI.
2, 2a	"	PUSILLUS.	13, 13a	"	5-DENTATUS.	24	"	BIDENTATUS
3, 3a, b	"	CONICICOLLIS.	14	"	CURVICRUS.	25, 25a	"	FLAVISETIS.
4	"	FILIROSTRIS.	15, 15a	"	SEMIRUFUS.	26, 26a	TACHYGONIDIUS	PHALANGIUM
5	"	ANGUSTICOLLIS.	16, 16a, b	"	NIGROCRISTATUS.	27, 27a	"	DASYPUS.
6, 6a, b	MACROLECHRIOPS	SPINICOXIS.	17	"	FASCICULOSUS.	28, 28a ♂	HYPOCÆLIODES	INÆQUALIS.
7, 7a	PSOMUS	QUADRINOTATUS.	18, 18a, b	"	BIFASCICULATUS.	29, 29a ♀	"	BICARINATUS
8	"	VIOLACEUS.	19, 19a-c	"	PECTINISQUAMIS.	30, 30a ♂	"	GIBICOLLIS
9, 9a-c	PHILINNA	BICRISTATA.	20	"	RHOMBUS.	31, 31a ♂	"	PULVEREUS.
10, 10a, b	PHILIDES	ANTHONOMOIDES.	21, 21a, b	"	CASEYI.	32, 32a, b ♂	"	CORONATUS
11	PIAZURUS	EPHIPPIATUS.	22, 22a	"	SINUATICRUS.	33, 33a ♀	"	PHYTOBIODES



1,1a♀ HYPOGÆLIODES CHIRIQUENSIS
 2♀ AULEUTES INSTABILIS
 3♀ " BIOLLEYI
 4,4a DIETZELLA SEXTUBERCULATA
 5,5a♂ PERIGASTER TETRACANTHUS
 6♂ CEUTHORRHYNCHUS TRUQUI
 7,7a♀ CEUTHORRHYNCHIDIUS WICKHAMII
 8♂ AMBATES CRETIFER
 9♀ " " var.
 10,10a♀ PSEUDAMBATES BIPLAGIATUS
 11♂ AMBATES POLYMORPHUS

12♂,13♀ AMBATES POLYMORPHUS, vars
 14,14a♂ " HEILIPOIDES
 15♂ " " var.
 16,16a♂ " ALBOVITTATUS
 17,17a♂ " LEUCOPLEURA
 18♂ " LATEVITTATUS
 19♀ " SINUATUS
 20,20a♀ " RHOMBIFER
 21,21a♀ " BELTI
 22♀ " FASCIOLATUS
 23♂ " OBLIQUUS

24,24a♂ AMBATES SEXPUNCTATUS
 25♂ " TRIANGULARIS
 26,26a♀ " TETRASTIGMA
 27♂ " MELANOPS
 28♀ " CÆCUS
 29♂ " OCELLATUS
 30♂ " NIGRONOTATUS
 31♀ " BIGUTTATUS
 32♂ " PICTIPENNIS
 33,33a♂ " BISIGNATUS
 34♀ " DUPLICATUS



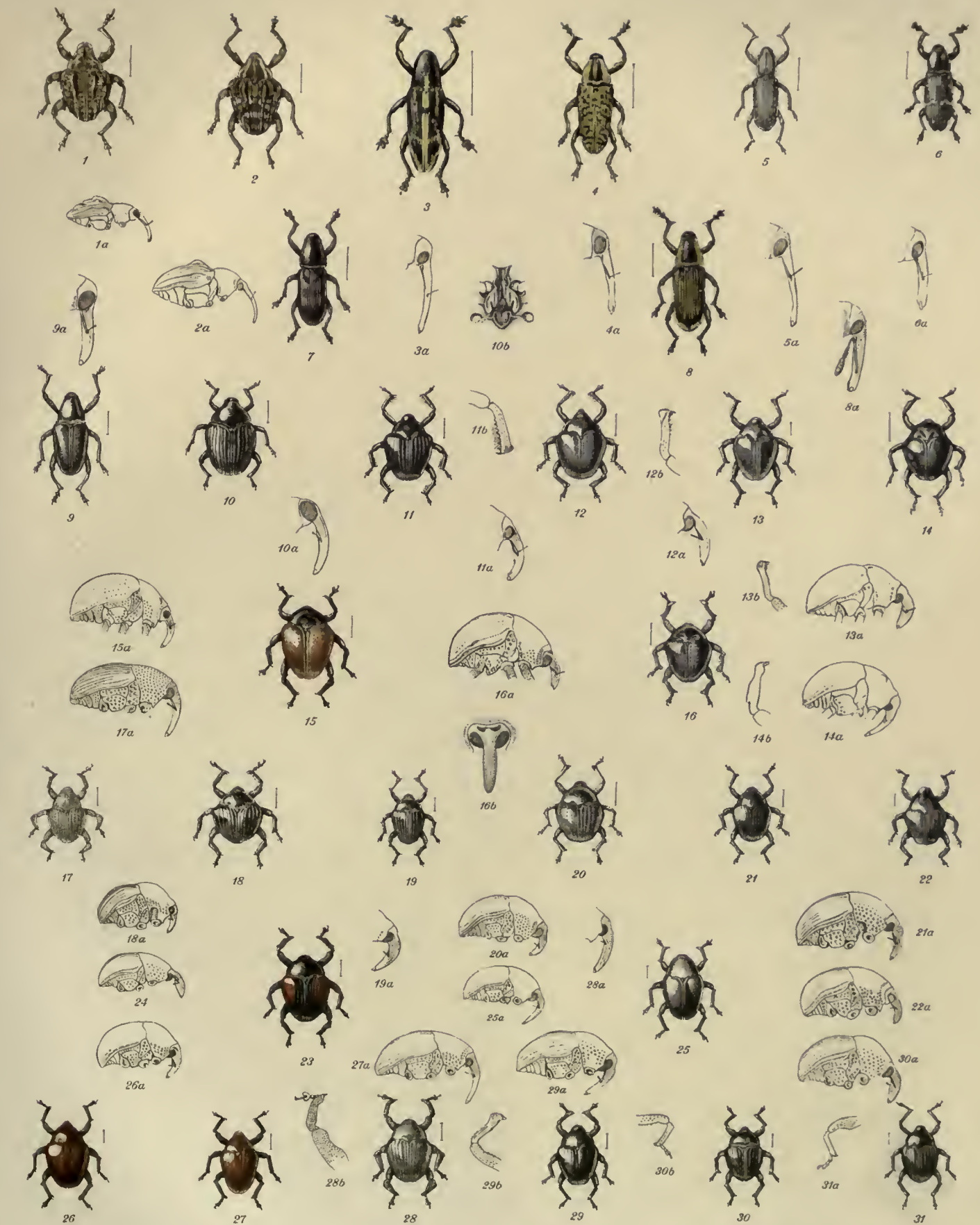
1,1a♀	AMBATES	EXCLAMATIONIS	12,12a♂	AMBATES	CLEROIDES.	23,23a♂	PERIDINETUS	RUFOTORQUATUS
2,2a♀	"	CIRCUMDUCTUS	13♂	"	PTERAGANTHUS	24,24a♀	"	LÆTUS
3,3a♂	"	SOLANI	14,14a♂	"	PERIDINETUS	25,25a	"	NODICOLLIS
4♂	"	"	15,15a♂	"	"	26	"	OPACUS
5,5a♀	"	ORNATVENTRIS.	16♂	"	"	27,27a	"	COSTATUS
6,6a♀	"	SCUTIGER	17,17a♂	"	"	28	"	STIGMATIPLEURA
7♀	"	ANGUSTATUS	18,18a♂	"	"	29,29a♂	"	4-MAGULATUS
8♀	"	APICALIS	19,19a♂	"	"	30,30a♂	PANTOTELES	HIRTIMANUS
9♂	"	VITTICOLLIS	20,20a♂	"	"	31♀	"	FLAVOFASCIATUS
10,10a♂	"	ALBIVENTRIS	21,21a♂	"	"	32♂	"	LONGIMANUS
11,11a♀	"	IMMACULATUS.	22,22a♂	"	"	33,33a♂	"	TENUIROSTRIS



1,1a♀ PANTOTELES MARMORATUS.
 2♂ " DIMIDIATUS.
 3,3a♂ " ALBOCINCTUS.
 4,4a PERIDINETELLUS SUBGLABER.
 5,5a♂ OPTATUS PALMARIS
 6,6a♂ " FASCICULOSUS.
 7,7a MACROPTATUS CHAMPIONI.
 8,8a♂ PSEUDOPTATUS DENTIPES.
 9,9a♂ LYDAMIS CINNAMOMEUS.
 10,10a CYRIONYX 10-COSTATUS.
 11,11a " 8-COSTATUS
 12,12a " RETICULATUS

13,13a CYRIONYX MACULICOLLIS.
 14,14a♂ " GIBBICOLLIS
 15,15a♀ " CRISTATUS
 16,16a♂ " NIGROSELLATUS
 17,17a♀ " BALANINOIDES
 18,18a♂ " CAVIROSTRIS
 19,19a " CAMELUS
 20,20a♂ " HUMERALIS
 21,21a♀ " TURBIDUS.
 22 " LAEVIROSTRIS
 23,23a♂ " EXIGUUS

24,24a♀ CYRIONYX BILINEATUS
 25 " SEMICOSTATUS
 26,26a " NITIDIPENNIS
 27 " APIATUS
 28,28a♂ " CLATHRATUS
 29,29a♀ " APICALIS
 30 " ALBOPLAGIATUS
 31 " SEXGUTTATUS
 32 " NIVEIPICTUS
 33 " OCHREONOTATUS
 34 " AMBATOIDES
 35 " OBLONGOGUTTATUS



- | | | | | | | | |
|----------|----------------------------|----------|------------|----------------|----------|------------|----------------|
| 1,1a | CYRIONYX CONOTRACHELOIDES. | 11,11a,b | DIORYMERUS | SERRIPES | 22,22a | DIORYMERUS | LATICRUS. |
| 2,2a | " SCAPULOSUS. | 12,12a,b | " | DENTICULATUS. | 23 | " | ORNATUS. |
| 3,3a♀ | NERTUS SUTURALIS. | 13,13a,b | " | PERLÆVIS. | 24 | " | QUADRISTRATUS. |
| 4,4a♂ | " ÆNEUS. | 14,14a,b | " | LÆVIPES. | 25,25a | " | LONGIROSTRIS. |
| 5,5a | STRONGYLOTES PARALLELUS. | 15,15a | " | ERYTHROPTERUS. | 26,26a | " | RUBRICATUS. |
| 6,6a♂ | TRACHYMEROPSIS PALMIPES. | 16,16a,b | " | FOSSULATUS. | 27,27a | " | NIGRIPES. |
| 7 | MADOPTERUS CYLINDRICUS. | 17,17a | " | PUNCTATUS. | 28,28a,b | " | ERYTHRONOTUS. |
| 8,8a♂ | " CONRADTI. | 18,18a | " | LATUS. | 29,29a,b | " | CANALICULATUS. |
| 9,9a | IASIDES CINCTICOLLIS. | 19,19a | " | EXARATUS. | 30,30a,b | " | SERRULATUS. |
| 10,10a,b | COLEOMERUS ISTHMICUS. | 20,20a | " | OVATUS. | 31,31a | " | SULCATUS. |
| | | 21,21a | " | CRIBRARIUS. | | | |



1,1a,b♀ DIASTETHUS EURHINOIDES
 2,2a♂ " VIOLAGEUS
 3,3a♂ " SUPERBUS
 4,4a♂ " SULCIPENNIS
 5,5a,b♂ " PILIPECTUS
 6,6a♂ " MEXICANUS
 7♂ " ATER
 8,8a♂ " PILIPES
 9,9a♂ " BREVIS
 10,10a♂ " RUFICOLLIS
 11,11a♀ " ERYTHRODERES

12,12a♂ DIASTETHUS AZTECUS
 13♂ " GRACILIROSTRIS
 14♂ " INTERRUPTUS
 15♀ " BIDENTATUS
 16,16a♂ " HUMEROSUS
 17,17a♂ " CASTANEUS
 18,18a♀ " HUMERONOTATUS
 19,19a♂ " RUFIPENNIS
 20,20a♀ " OBLIQUUS
 21,21a GOLEOMEROPSIS GRIBRICOLLIS
 22,22a♂ RHIANOPSIS FERRUGINEUS

23,23a,b♂ LISSOBARIS NIGROPICEUS.
 24,24a♂ CYLINDRO CERUS COMMA
 25,25a,b♂ " MADAROIDES
 26,26a♀ " SUBULATUS
 27,27a♀ " CIRCUMLINEATUS
 28♀ " LONGIPENNIS
 29,29a♂ " LISSONOTUS
 30,30a♂ " GLABRATUS
 31,31a RHIANUS MEXICANUS
 32,32a " NIVEISCUTUM
 33,33a♂ " IMPRESSUS



- 1,1 PSEUDORHIANUS COMPRESSIROSTRIS
 2,2aδ LAMPROBARIS CUCULLATUS
 3,3aδ " RUFONOTATUS
 4,4a,b PLATYBARIS LAMELLIFER
 5,5aδ DIORYMEROPSIS DISJUNCTUS
 6,6a♀ CHÆTOBARIS NIGROSETOSUS
 7,7aδ ELLIPTOBARIS SETULOSUS
 8,8aδ ACANTHOBARIS CASTANEIPENNIS
 9,9a DIORYMERFLLUS LAEVIPENNIS
 10 " CAST. NEICOLOR
 11 " HISTEROIDES

- 12♂ CERPERES GLABRESCENS
 13,13aδ " RUFESCENS
 14,14a♀ CYLINDROGERINUS TUBIFER
 15,15a,bδ MICRORHIANUS HAMATUS
 16,16aδ EUGERÆUS UNIFASCIATUS
 17,17aδ " DISCIFER
 18,18a,b PRIONOBARIS ASPER
 19,19a♀ GERÆUS ARCUATIROSTRIS
 20,20a♀ " PILOSUS
 21,21a,bδ " SERRATISPINIS
 22,22aδ " SINUATISPINIS

- 23,23a,bδ GERÆUS BIPUSTULATUS
 24,24a,bδ " PODAGROSUS
 25,25aδ " SENILIS
 26,26aδ " RECTISPINIS
 27,27aδ " TRINOTATUS
 28,28aδ " TENUISPINIS
 29,29a♀ " GEMAS, var.
 30,30aδ " TRILINEATUS
 31,31aδ " BALANINOIDES
 32,32aδ " SCABROSUS
 33,33a♀ " INORNATUS



1, 1a♂ GEREUS LINEELLUS
 2, 2a♂ " TRIVITTATUS
 3, 3a♂ " TETRASTIGMA
 4, 4a♀ " TÆNIATUS
 5, 5a, b♀ " FLAGELLIFER
 6, 6a♂ " CRUCIFER
 7, 7a♀ " OCTOMACULATUS
 8, 8a♂ " MARGINATUS
 9, 9a♂ " HIRTIPES
 10, 10a♂ " SPINIGER
 11♂ " SINUATIPES

12, 12a♂ GEREUS LENTIGINOSUS
 13, 13a♂ " AMPLIGOLLIS
 14♀ " COARCTATUS
 15, 15a♂ " ALBOLINEATUS
 16, 16a♀ " " var.
 17, 17a♀ " X-NOTATUM
 18, 18a♂ " TUMIDIROSTRIS
 19, 19a♂ " GENTILIS
 20, 20a♂ " SCULPTICOLLIS
 21, 21a♂ " CURVISPINIS
 22, 22a♂ " TENEBRICOSUS
 23, 23a♂ " PUGNAX

24, 24a♂ GEREUS BASINOTATUS
 25, 25a♂ " SUBMACULATUS
 26♂ " FURCIFER
 27, 27a♂ " PEXUS
 28, 28a♂ " UNICORNIS
 29, 29a♂ " TUBERCULIFER
 30, 30a♂ " PUNCTICOLLIS
 31, 31a♂ " SCUTATUS
 32, 32a♂ " ASPERSUS
 33, 33a♂ " LONGICLAVA
 34, 34a♂ " TENUICLAVA



1,1a♀ GERÆUS TECTUS
2,2a,b♂ " VIRIDICANS
3,3a♀ " SCITULUS
4,4a♀ " BIFURCATUS
5,5a♂ " 10-LINEATUS
6,6a♀ " OMITEMÆ
7,7a♂ " CILIATIPES
8,8a♂ " DUGESI
9,9a♀ " BICRUCIATUS
10,10a♂ " LINEATULUS
11,11a♂ " INERS

12,12a,b♂ GERÆUS TONSILIS.
13,13a♂ " GAUMERI
14,14a♂ " CANDIDUS
15,15a,b♂,16♀ " HOSPES.
17,17a♀ " VARIUS
18,18a♀ " LEUCOMELAS
19,19a♂ " NUBIFER
20,20a♂ " FARINOSUS
21,21a♀ " BREVICULUS
22,22a♂ " NUDIPENNIS
23♀ CENTRINOPUS ALTERNATUS
24,24a♂ " MISTUS.

25,25a♂ NICENTRUS LINEICOLLIS
26,26a♀ " TESTACEIPES
27,27a♂ " CANDIDULUS.
28,28a♀ " 10-NOTATUS
29,29a " FEMCRALIS
30,30a♀ " LOBATUS
31,31a,b♂ ODONTOCORYNUS CREPERUS
32♂ " LATISCAPUS
33,33a♂ " SUTURA-FLAVA
34,34a♀ " LARVATUS
35,35a♂ PSEUDOGERÆUS MACROPTERUS



1, 1a, b ♂ CENTRINITES AUDAX
 2, 2a, b ♂ " T. FLAVUM
 3, 3a, b ♂ " LATICRUS
 4, 4a, b ♂ " DENTIMANUS.
 5, 5a, b ♂ CENTRINOIDES CILIARIS
 6, 6a ♂ PSEUDOCENTRINUS OCHRACEUS
 7, 7a ♀ " "
 8, 8a, b ♂ " HYBRIDA
 9, 9a ♂ GERÆOPSIS DUPLOCINCTUS
 10, 10a ♂ CESENNIA LATECINCTA
 11, 11a, b ♂ PLATYONYX ORNATUS
 12, 12a ♂, 13 ♀ AMERCEDEC ORTHORRHINUS

14, 14a ♂ ZYCOBARIS TRISTICULA
 15, 15a, b ♂ CATAPASTINUS CASEYI
 16, 16a, b ♂ CATAPASTUS RUFICLAVA
 17, 17a, b ♀ CNAGIUS CAVIPECTUS.
 18, 18a, b ♂ COLUTHUS CRIBRARIUS
 19, 19a, b ♂ CYLINDROBARIS BREVIROSTRIS
 20, 20a ♂ BARILEPTON FAMELICUM
 21, 21a, b ♂ CHRYASUS PLAGIATUS
 22 ♂ " CAVERNOSUS
 23, 23a DEIPYRUS HIRSUTULUS
 24, 24a ZAGLYPTUS COSTATUS

25, 25a ZAGLYPTUS CRISPUS
 26, 26a PLOCAMUS ECHIDNA
 27, 27a ♀ " CLAVISETIS
 28, 28a ♂ " HISPIDULUS
 29, 29a " HYSTRIX
 30, 30a LIMNOBARIS CARBONARIA
 31, 31a ♂ " LATIDENS
 32, 32a ♂ " CALANDRIFORMIS
 33, 33a ♀ " QUADRICOLLIS
 34, 34a ♀ " UNIFORMIS
 35, 35a, b ♂ " DENTIFER
 36, 36a ♂ " LANGUIDA



- | | | | | | |
|--------------|---------------------------|-------------|-------------------------------|------------|-----------------|
| 1, 1a | CALANDRINUS GRANDICOLLIS. | 13, 13a | ORTHOMERUS PITTIERI. | 28, 28a | MADARUS CORNIX |
| 2, 2a | LIMNOBARIS BICINCTA | 14, 14a | PSEUDORTHOMERUS CONSANGUINEUS | 29, 29a | " CHIRIQUENSIS. |
| 3, 3a | " BIFASCIATA | 15, 15a, b | EUTOXUS FOVEATUS. | 30, 30a | " CLAVIPES |
| 4, 4a | " DESIDIOSA | 17, 17a, 18 | " LACORDAIREI | 31, 31a | " MIRANDILLE |
| 5, 5a | " DISCRETA | 19, 19a | " PLICATILIS. | 32, 32a | " EUTOXOIDES |
| 6, 6a | " TRUQUI | 20, 20a | " FRATERNUS | 33, 33a | " TUMEFACUS |
| 7, 7a | " RUFULA | 21, 21a | PSEUDEUTOXUS FILIROSTRIS | 34, 34a, b | " ILLUSTRIS |
| 8, 8a | " CYLINDRICLAVA | 22, 22a | " | 35, 35a, b | " SCAPHIFORMIS |
| 9, 9a, b, 10 | LIMNOBAROIDES EXPOSITA | 23, 23a, b | CALANDROMIMUS CAVITVENTRIS | 36, 36a, b | " VITOSUS |
| 11, 11a | " FLAVOLIMBATA. | 24, 24a, 25 | MADARUS 4-PUSTULATUS | 37, 37a, b | " TREMULUS |
| 12, 12a, b | PSEUDORTHORIS DEVEXUS | 26, 26a | " CORVINUS | 38, 38a, b | " ASTUTUS |
| | | 27, 27a | " HETEROSTERNUS | | |



1, 1a♂ MADARUS VORTICOSUS
 2♂ " DISTIGMA
 3, 3a♂ " BISTRIGELLUS
 4, 4a♂ " BISIGNATUS
 5, 5a♂ " BREVILINEA
 6, 6a♂ " MACROGRAMMUS
 7♂ " BILINEATUS
 8, 8a♂ " EXCAVATUS
 9, 9a♂ " FUSIFORMIS
 10, 10a♀ " BISULCATUS
 11, 11a♀ " OCHREOGUTTATUS
 12, 12a♂ MADARELLUS INEQUALIS

13, 13a♂ MADARELLUS PUNICEICOLLIS
 14♀ " RUFOMACULATUS
 15, 15a♀ " LEVICOLLIS
 16, 16a♂ ACANTHOMADARUS DIRUS
 17, 17a, b♂ LOBODERES FLAVICORNIS
 18♀ " "
 19, 19a, b♂ " SULPHUREIVENTRIS
 20, 20a♀ " GLABRIVENTRIS
 21, 21a, b♂ RADAMUS ATRATUS
 22, 22a♂ AMPELOGLYPTER SPECULIFER
 23, 23a♀ " PLICATIPENNIS
 24, 24a, b♂ SOLARIA ACUTIDENS

25♀ SOLARIA ACUTIDENS
 26 " ISTHIA
 27, 27a♂ " GIBBA
 28, 28a♂ " COMPRESSICOLLIS
 29, 29a, b♂ EURHINUS CHEVOLATI
 30, 30a♂ " ATRITARSIS
 31, 31a, b♂ " CUPRIPES
 32, 32a, b♂ " VIRIDIPES
 33♂ " FESTIVUS
 34♂ " " MAGNIFICUS
 35♂ " " SUTURALIS
 36, 36a♂ " YUCATECUS



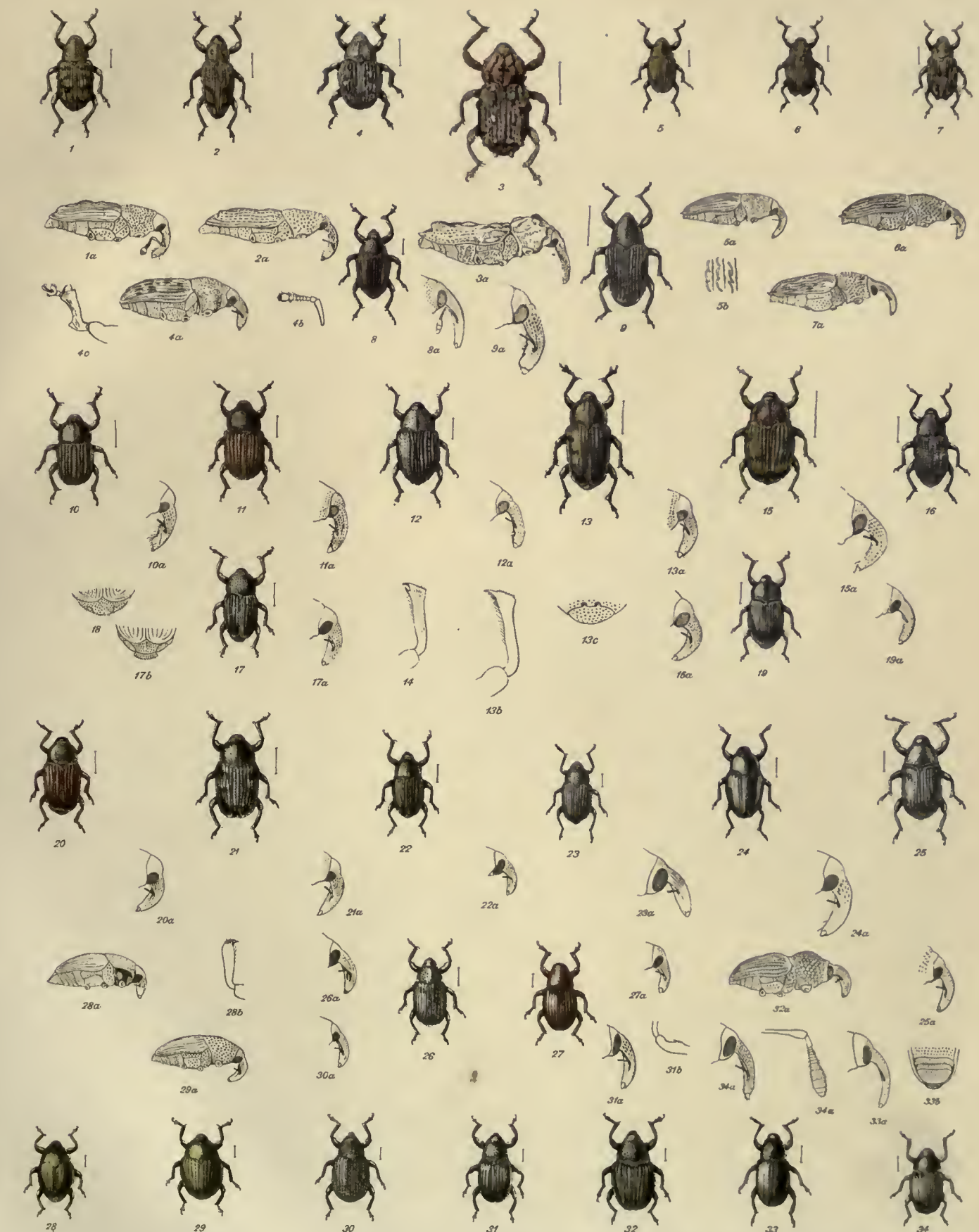
1,1a♀ EURHINOPSIS ÆRUGINOSUS
2,2a,b " VIRIDICOLOR.
3,3a,b♂ STETHOBAROIDES NUDIVENTRIS
4,4a♂ " PILIVENTRIS
5,5a♂ ANISORRHAMPUS SCAMIVENTRIS.
6,6a,b♂ MADAROPSIS SULCIPECTUS
7,7a SPHENOBARIS QUADRIDENS
8,8a,b♀ DEIPYLE INDUTA
9,9a♀ " SEMINUDA
10,10a♂ GLYPTOBARIS RUGATA.
11,11a♂ " SPINIGERA

12♀ GLYPTOBARIS SOLARII
13♀ " LECONTEI, var.
14,14a♂ " SIMPLEX
15,15a RHYTIDOBARIS HORRIDA
16,16a " GRANULOSA
17,17a,b♂ LEPIDOBARIS ACNISTI
18,18a♀ " OPACIPENNIS
19,19a♂ " BIFASCICULATA
20,20a,b♀ " LATISQUAMIS
21,21a♂ " NITIDIPENNIS.
22♂ TRICHOBARIS VESTITA

23,23a♀ TRICHOBARIS SOROR
24,24a♂ " PELLICEA
25,25a CYANOBARIS RUFIVENTRIS
26,26a♂ ANOPSISILUS BONVOULOIRI
27,27a,b♂ LEPTOBARIS BIDENS
28,28a,b MACROBARIS PRODUCTA
29,29a♂ DOLICHOBARIS OPACICEPS
30♀ " "
31,31a,b ODONTOBARIS PLANIROSTRIS
32,32a♂ STICTOBARIS CRIBRATA
33,33a♂ TREPOBARIS PERLONGA



- | | | |
|-----------------------------------|---------------------------------------|--------------------------------------|
| 1, 1a♂ GYMNOBARIS BREVIDENS. | 12, 12a, b♂ PSEUDOBARIS CARINIPECTUS. | 24, 24a♀ PSEUDOBARIS APICALIS |
| 2, 2a♂ ONYCHOBARIS PUNCTATISSIMA. | 13, 13a, b♂ " FASCICULATA. | 25, 25a♂ " LUCENS. |
| 3, 3a, b♂ PSEUDOBARIS BIGUTTATA. | 14, 14a♂ " MULTIGUTTATA. | 26♀ " STIGMATICA. |
| 4, 4a♀ " DISPARILIS. | 15, 15a♂ " LEUCOSTIGMA. | 27, 27a, b♀ " ACUTIPENNIS. |
| 5, 5a♀ " SEXGUTTATA. | 16, 16a♂ " CYLINDRICOLLIS. | 28, 28a♂ " Plicata. |
| 6, 6a♀ " NIVEOGUTTATA | 17, 17a, b♂ " ATITLANA. | 29♂ " GIBBICOLLIS |
| 7, 7a♂ " SINUOSA. | 18, 18a♂ " DENTIPES | 30, 30a, b♂ " LUCIDA |
| 8, 8a♀ " IRREGULARIS. | 19, 19a♂ " TIBIALIS. | 31♀ " " |
| 9, 9a♂ " COSTIROSTRIS. | 20, 20a♀ " SENESCENS | 32, 32a, b♀ " DIVIDUA |
| 10, 10a, b♂ " OSCILLANS | 21, 21a♂ " BINOTATA | 33, 33a, b♀ " ABRUPTA |
| 11, 11a♀ " OCTONOTATA. | 22, 22a♂ " NOTATA | 34, 34a, b♂ CERCOBARIS FORTIROSTRIS. |
| | 23, 23a♀ " UNDULATA | |



- | | | | | | |
|---------|---------------------------|-----------|--------------------|-----------|-----------------------------|
| 1,1a♂ | PHYSOBARIS INTRICATA | 12,12a♀ | BARIS SULCIPENNIS. | 24,24a♀ | BARIS MACRASPIIS |
| 2,2a♂ | " NODOSA. | 13,13a-c♂ | " FLUCTUOSA | 25,25a♀ | " QUADRATIPENNIS |
| 3,3a♀ | TRACHYBARIS CÆLATA. | 14♀ | " " | 26,26a♂ | " PRODITA |
| 4,4a-c♀ | BUSCKIA LECYTHIDIS | 15,15a♀ | " FERVIDA. | 27,27a | " RUBICUNDULA |
| 5,5a,b♀ | CHRYSOBARIS PLURISSETOSA. | 16,16a♀ | " RUGOSISSIMA | 28,28a,b♂ | BRACHYBARIS NUTILA |
| 6,6a♂ | " CORROSA | 17,17a,b♂ | " DURANGOANA. | 29,29a♂ | BRACHYBARIDIUS IMMARGINATUS |
| 7,7a♂ | " COTHURUS | 18♀ | " " | 30,30a♂ | NANOBARIS PLUMBATA |
| 8,8a♀ | CHALCOBARIS PANAMENSIS | 19,19a♀ | " ROTUNDICOLLIS | 31,31a,b♀ | TYTHOBARIS CAVIMANUS |
| 9,9a♂ | BARIS INGENS | 20,20a♀ | " SUBRUBRA | 32,32a | CYRTOBARIS BIGIBEA |
| 10,10a♂ | " STRENUA | 21,21a♂ | " CAVERNOSA | 33,33a,b♂ | LITOBARIS SUBPRINOSA |
| 11,11a♀ | " SINUATIROSTRIS | 22,22a♂ | " ÆREA | 34,34a,b♂ | OLIGOBARIS BREVICUTUM |
| | | 23,23a♂ | " SERIATOSSETCSA | | |



1, 1a ♂ *BARIS SPISSIROSTRIS*.
 2, 2a ♀ " *OCCIDUA*.
 3, 3a, b ♂ " *ASPERA*.
 4, 4a, b ♀ " *INOPINA*.
 5, 5a ♀ " *TORTILIS*.
 6, 6a ♂ " *CALDARIA*.
 7, 7a ♂ *COPTURUS FAUSTI*.
 8, 8a " *GRIBRICOLLIS*.
 9, 9a *LECHRIOPS ERYTHORRHYNCHUS*.
 10 " " *var.*

11, 11a, b ♂ *PHILIDES COMANS*.
 12, 12a ♂ *AMBATES ISTHICOLA*.
 13, 13a ♂ " *CHETCPUS*.
 14, 14a *DIORYMERUS RUBER*.
 15, 15a ♂ *GERÆUS SQUAMIROSTRIS*.
 16 ♀ " " "
 17, 17a ♂ " *SUBNERMIS*.
 18, 18a ♀ " *COSTATUS*.
 19 ♀, 20 ♂ " *PUERULUS*.
 21, 21a ♂ " *TONSUS*.

22, 22a ♀ *GERÆUS PENICELLUS, var.*
 23, 23a ♀ " *TENUISTRATUS*.
 24 *ODONTOCORYNUS SALEBROSUS*.
 25, 25a ♂ *LASIOBARIS WICKHAMI*.
 26, 26a " *GEMINATA*.
 27, 27a ♀ *LEPTOSCHÆNUS MACULATUS*.
 28 ♂ " " "
 29, 29a ♀ *CATAPASTUS NIVESCENS*.
 30, 30a *LIMNOBARIS PARILIS*.
 31, 31a ♂ *ORTHORIS CYLINDRIFER*.

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